An Evaluation of Statewide Quality Improvement Activities by Oregon Health Plan Managed Care Organizations, 2003–2005

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Executive Summary

Recently, the Oregon Health Plan (OHP) has faced some of its greatest challenges. A troubled state economy and other factors have resulted in benefit changes and tightened eligibility requirements for members. Despite these challenges, the Oregon Office of Medical Assistance Programs (OMAP), the fully capitated health plans, providers that constitute the health service delivery system for OHP, and other stakeholders have continued to dedicate efforts to maintaining and improving the timeliness of, quality of, and access to healthcare services for OHP members.

The health plans that serve OHP members are required to participate in quality improvement (QI) activities in cooperation with OMAP. To ensure that health plans are providing the intended quality of care, and to assist OMAP and the health plans in fulfilling of the requirements of the federal Medicaid managed care rules, OMAP has contracted with the Oregon Medical Professional Review Organization (OMPRO) to serve as its Medicaid managed care external quality review organization (EQRO).

The 2003–2005 EQR contract between OMAP and OMPRO was established prior to the effective date for compliance with the EQR component of the Medicaid managed rules. Although the performance improvement projects (PIPs) and performance measurements (PMs) of the health plans incorporate many of the principles and concepts in the CMS EQR protocols, OMPRO did not formally assess the PMs and PIPs according to the protocol criteria, but rather, used the protocols as guidelines. This evaluation, therefore, demonstrates some conformance with the CMS EQR requirements and anticipates full alignment with the EQR rules and protocols.

This report is OMPRO's assessment of statewide QI activities and programs. The assessment consists of an inventory of QI activities in the state, and recommendations to

- help OMAP coordinate current QI activities with the state's quality assessment and improvement strategy
- assist health plans in meeting the requirements of the federal Medicaid managed care rules governing QI efforts

The extensive inventory of statewide QI activities explored in this report demonstrates that health plans have allied with different healthcare organizations to

- support tobacco cessation efforts
- prevent early childhood cavities
- ensure that children enrolled in OHP receive proper immunizations
- provide prenatal care for pregnant OHP members
- improve care and treatment for people with asthma, diabetes, and depression
- eliminate disparities in healthcare among racial and ethnic groups
- ensure health care for members with special needs

Through these efforts, and by conducting structured performance improvement projects (PIPs) and performance measurements (PMs), the health plans and OMAP have committed substantial resources to ensure and improve the quality of, timeliness of, and access to, health care. OMAP and its QI coordinators have supported this commitment through

- monthly QPI Workgroup and medical director meetings
- semiannual statewide QI workshops
- efforts such as performance measurement, QIE, and EQR

projects that improve care for OHP members

Providing high-quality care and access to services in a cost-effective and timely manner in the face of decreasing funding has been a predominant theme of all statewide activities. There is strong evidence that the topics, measures, and opportunities for improvement have been identified using data, systematic approaches, and consensus decision making.

As statewide QI activities become fully aligned with the Medicaid managed care rules, health plans can anticipate requirements for greater internal and external consistency than was required in past projects. Articulating clear study questions and employing precise technical specifications, such as robust sampling and data collection methods, are some of the requirements outlined in the CMS EQR protocols. Future mandatory validation audits will evaluate PMs and PIPs for this level of rigor.

The challenge for OMAP will be to create a coordinated QI program that embraces the variety of existing improvement activities and incorporates all of the required elements in a systematic fashion that leads to continuous quality improvement. OMAP should consider the following strategies as it moves into full implementation of its quality assessment and improvement activities:

- Structure state-sponsored QI activities to support the design and implementation of valid PIPs and PMs at the health plan level.
- Consistently articulate and reinforce standardized, valid, reliable data collection.
- Continue the coordination of managed care structure and operation standards and train and monitor health plans for consistent application of the standards.
- Designate a lead expert to serve as interpreter and consultant.
- Articulate a four-phase framework for linking QI activities to each other and to the overall quality assessment and improvement strategy.

The four-phase a framework would provide a "critical path" showing the relationships between activities and the rationale for identifying and prioritizing opportunities for improvement, defining inputs and desired outcomes, and sequencing activities over time. The framework would also coordinate annual planning and review, and QI-related contract requirements.

The four recommended phases are as follows:

1. Opportunity surveillance
2. Quality assessment
3. Performance improvement
4. Holding the gains

The use of this framework would link many elements of the state's quality assessment and improvement strategy in a logical sequence and provide a predictable basis for changing health plan QI contract requirements to meet priorities. The framework allows for immediate implementation at any phase in the cycle and elevates QI planning to a strategic (three- to five-year) time frame, providing flexibility while assisting OMAP and the health plans to "stay the course" of QI in the midst of turbulent times.

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Introduction

Recently, the Oregon Health Plan (OHP) has faced some of its greatest challenges. A troubled state economy and other factors have resulted in benefit changes and tightened eligibility requirements for members.[1] Despite these challenges, the Oregon Office of Medical Assistance Programs (OMAP)—the agency under the Department of Human Services (DHS) responsible for administering OHP—the fully capitated health plans (also called FCHPs, or hereinafter, health plans), providers that constitute the health service delivery system for OHP, and other stakeholders have continued to dedicate efforts to maintaining and improving the timeliness of, quality of, and access to the healthcare services for OHP members.

Initially prompted by accounts of members encountering barriers to care and other quality-related problems, federal agencies increased oversight of the quality of Medicaid managed care. Over time, developments in the private sector around continuous quality improvement (CQI) and the defining feature of managed care—that organizations can be held accountable for services or care—galvanized the Congress, Centers for Medicare & Medicaid Services (CMS), and states to provide greater support for, and scrutiny of, Medicaid managed care QI activities. The results of this resolution were codified in one section of the Code of Federal Regulations (CFR) as the Medicaid managed care rules.[2]

The federal Medicaid managed care rules stipulate that health plans uphold a certain level of care for the Medicaid population. Section 1932(c) of the Social Security Act specifies how quality measurement and performance improvement methods should be applied to Medicaid managed care programs:[3]

- All state Medicaid agencies must develop and implement a quality assessment and improvement strategy that includes
  - standards for access to care
  - examination of other aspects of care and services related to improving quality
  - monitoring procedures for regular and periodic review of the strategy
- state agencies that contract with Medicaid managed care organizations (MCOs), including health plans, must provide for an annual, external, independent review of the timeliness of, quality of, and access to the healthcare services included in the contract between the agency and the MCO or health plan.

The health plans that serve OHP members have been required by the OHP-FCHP contract[4] and the Oregon Administrative Rules (OARs)[5] to participate in QI activities in cooperation with OMAP. To help ensure that health plans are providing the intended quality of care, and to assist OMAP and the health plans in the transition to fulfilling the requirements of the

federal Medicaid managed care rules, OMAP has contracted with the Oregon Medical Professional Review Organization (OMPRO) to serve as its Medicaid managed care external quality review organization (EQRO). As part of this contract, OMAP has commissioned OMPRO to undertake an assessment of QI activities and programs in which the health plan participate, and to provide recommendations as to how these activities can best be coordinated with the state's quality assessment and improvement strategy while meeting the new federal requirements. This report is the result of OMPRO's assessment and research activities from May 2003 through April 2005.

Purpose and objectives

The purpose of this report is to describe the 2003–2005 statewide QI activities undertaken by the OHP health plans, and to establish a foundation upon which to enhance the state's QI program. Included in the evaluation is an inventory of QI activities, programs, and projects (covering both clinical and nonclinical areas) pertinent to the OHP managed care population that were undertaken to satisfy contract requirements or through plan-initiated efforts. The objectives of the evaluation are to

- inventory previous and current activities around clinical and nonclinical topics in which health plans have been involved
- examine activities for consistency with federal protocols for EQR-related activities
- investigate ways in which QI activities can be coordinated as a comprehensive and cohesive state quality improvement and assessment strategy

OMAP QI activities

OMAP requires, through its contracts, that each MCO have an ongoing quality assessment and performance improvement program (QAPI) for the services it furnishes to its members. The basic elements required in a QAPI include at least two performance improvement projects (PIPs) around clinical or nonclinical topics, and two performance measures (PMs). Additionally, OMAP reviews the impact and effectiveness of all QI activities annually.

All MCOs are required to participate in the state-sponsored PIPs—which were smoking cessation and prevention of early childhood cavities in 2003–2005—or develop their own projects with approval from OMAP. A PIP entails the study of a specific clinical or nonclinical topic relevant to the managed care population, implementation of an intervention, collection and measurement of data, and data submissions at regular intervals.

Each MCO must identify opportunities for performance improvement and submit standardized PMs to OMAP annually. OMAP reviews each plan's PMs as part of the Quality Improvement Evaluation (QIE) program and ongoing performance monitoring. OMAP expects that MCOs will address the opportunities for performance improvement through plan-specific PIPs, as required in the CFR, or through participation in statewide QI activities.

Through the Quality and Performance Improvement (QPI) Workgroup and other activities, MCO staff attend presentations on educational topics, disseminate improvement tools, and share best practices and systems changes in the clinical and nonclinical topics that the plan has measured.

OMAP's responsibilities to ensure health plan compliance with standards established by OMAP and the effectiveness of health plan QI programs were fulfilled, in part, through the QIE. As part of a QIE, the health plan supplies documentation and information requested by the OMAP QI team at least every three years. The QI team reviews all materials to determine the health plan's compliance with rules, assess their QI program, and establish standards in determining the need for additional review of appropriate medical/dental management practices and utilization.

In addition to the QIE, each health plan is responsible for submitting a self-evaluation of its quality and performance improvement (QPI) program in an annual QI report. The evaluation includes a description of completed and ongoing QI activities in clinical and nonclinical areas, and an evaluation of the QPI program's overall effectiveness.[6] The areas for evaluation include

- addressing the timeliness of, quality and appropriateness of, and access to care. Projects may include a review of clinical records, utilization reviews, referrals, co-morbidities, prior authorizations, emergency services, out-of-network utilization, member medications, health plan-initiated disenrollments, encounter data management, and member access to care and services.
- assessing the timeliness of, quality and appropriateness of, and access to care for OHP members who are aged, blind, or disabled; for children receiving Child Welfare or Oregon Youth Authority services; or for OHP members with special healthcare needs, which includes those in the Exceptional Needs Care Coordination (ENCC) program.[7] OMAP members who experience adverse events are also evaluated in this report.
- reporting on the process of adoption and dissemination of evidence-based clinical practice guidelines, and on the identification of specific adopted guidelines

External quality review (EQR)

Oregon has a long-standing practice of contracting for the EQR of OHP health plans. EQR is the analysis and evaluation of aggregated information on the timeliness of, quality of, and access to the healthcare services that a health plan provides to Medicaid recipients. An external quality review organization (EQRO) meets certain competency and independence requirements.

Three EQR-related activities are a mandatory part of the review:

- validation of PIPs required by the state that were under way during the preceding 12 months

- validation of PMs reported to, or calculated by the state during the previous twelve months.
- a review to determine the MCO's compliance with standards for the conduct of PIPs and calculation of PMs established by the state

The 2003–2005 EQR contract between OMAP and OMPRO was established prior to the effective date for compliance with the EQR component of the Medicaid managed rules. Although the PMs and PIPs of the health plans incorporate many of the principles and concepts in the CMS EQR protocols, OMPRO did not formally assess the PMs and PIPs according to the protocol criteria, but rather, used the protocols as guidelines. In addition, OMPRO's contract with OMAP specified several optional EQR activities, as listed in the CMS EQR protocols. Table 1 lists the optional activities and indicates whether OMPRO, as the EQRO, used information from the optional activity in its 2003–2005 review. For details on the EQR process in Oregon, see page 30 of this report.

In addition to the elements required under the current OHP-FCHP contract, there are many ongoing statewide activities focused on improving health care in particular areas such as chronic diseases and tobacco use. These activities take the form of public health initiatives or collaboratives, sponsored by state programs, or by a public-private coalition or task force, involving representation from state health agencies in addition to clinicians, health plan staff, advocacy organizations and/or consumers, and other community-based organizations.

Figure 1, QI activities in Oregon, 2003–2005, illustrates the breadth of activities that health plans are undertaking with an aim toward quality and performance improvement. The activities include programs, projects, and studies that were

- undertaken in partnership with OMAP
- undertaken at the discretion of health plans, including statewide initiatives and self-initiated projects
- related to EQR

OMPRO included the activities in this comprehensive list in order to identify opportunities within existing activities that could be leveraged in the future as health plans and OMAP coordinate full implementation of the CMS EQR protocols.

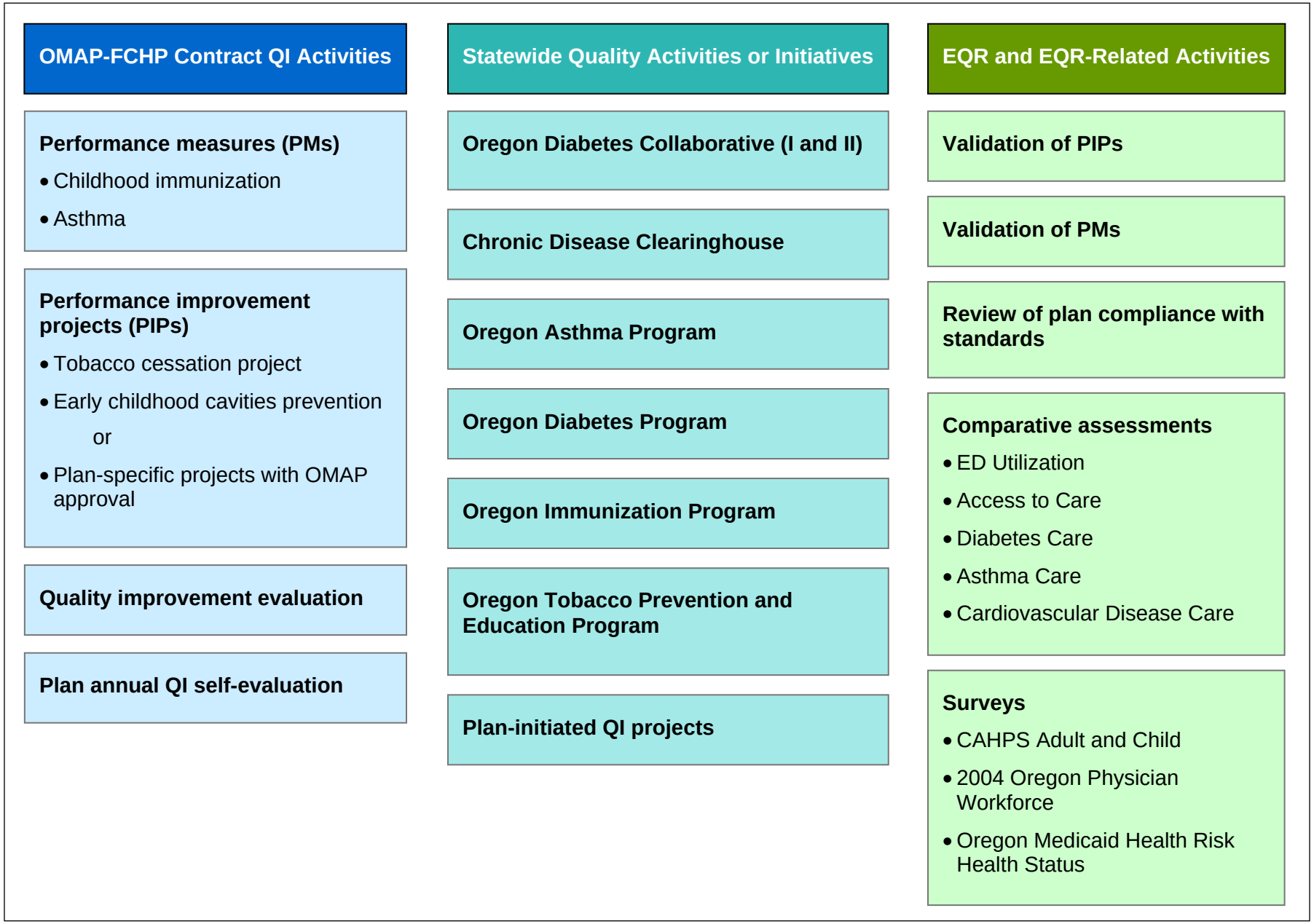

Figure 1. QI activities in Oregon, 2003–2005.

How to read this report

The report is arranged in four major sections. The Inventory of QI Activities section, beginning on page 9, includes past and current activities undertaken by the health plans and OMAP. The inventory was compiled to provide a description of the breadth of QI activities—internal health plan projects and those sponsored by OMAP—and serves as the foundation on which OMPRO has made recommendations to forge a coordinated state QI strategy. The inventory synthesizes findings from review of QI activity documents, previous EQR findings, interviews with health plan QI coordinators, and participation in the QPI Workgroup. Most QI activities focus on a clinical topic; therefore, the inventory is organized by topic area. Some QI projects also have a nonclinical focus, such as reducing racial and ethnic health disparities.

The Assessment section, beginning on page 33, covers an evaluation of the current PIPs and PMs. OMPRO adapted the CMS EQR protocols *Validation of Performance Improvement Projects* and *Validation of Performance Measures* to guide the review.

The Discussion section, beginning on page 55, is an examination of QI programs and activities using eight evaluative questions. Most of the questions were adapted from the CMS EQR protocols:

- How well do the QI activities address OHP members' needs, care, and services?
- Do the QI activities address over time a broad spectrum of key aspects of care, such as quality, access, and cultural competence?
- Does the QI activity make the best use of existing data sources to measure the target of the activity?
- Does the QI activity have a clearly defined mission, goal, objectives, measures, and tasks? What are they?
- Does the QI activity provide meaningful information based on race?
- Have QI activities included high-risk, high-prevalence, and clinical and nonclinical areas?
- Are there areas within the QI activities that could be improved? Which areas could be improved and how receptive are participants to making changes?
- What are the "best practices" of healthcare providers within the state? Are there other best practices nationally that could be introduced?

The Conclusions and Recommendations section, beginning on page 63, is a high-level synthesis of the observations and recommendations made throughout this report.

Study Methods

OMPRO began the assessment by performing an inventory of statewide QI activities to assess the activities each health plan is required to undertake as specified in its contract with OMAP, the OARs, and the State Quality Improvement and Assessment Strategy.[8,9]

Evaluation time frame

Year one of the evaluation was devoted to defining the scope of the evaluation, collecting data, interviewing stakeholders, and participating in the Quality and Performance Improvement (QPI) Workgroup. Year two was devoted to synthesizing and analyzing the data, updating the QI activities inventory, continuing to participate in the QPI Workgroup, and formulating a comprehensive assessment and recommendations.

Criteria

OMPRO used a broad set of inclusion criteria to sort through the plethora of programs and projects in Oregon. A project or QI activity was included for study if a health plan had already begun implementation and if it

- met the definition of QI as specified in the OARs: "the effort to improve the level of performance of a key process or processes in health services or health care. A QI program measures the level of current performance of the processes, finds ways to improve the performance and implements new and better methods for the processes. QI includes the goals of quality assurance, quality control, quality planning, and quality management in health care." [10]
- was an intervention primarily targeted at healthcare delivery system process improvement versus broad public health, data collection, and educational initiatives
- appeared to directly target, or have a special focus on, OHP members
- directly involved collaboration with OHP health plans and providers
- was or is designated as a PM
- was or is designated as a PIP

Data and information sources

The following resources were used to inform the inventory, assessment, and discussion in this report:

- **Interviews with health plan QI coordinators.**[11] After OMPRO reviewed the most current QIE reports and reviewing QPI meeting documents and materials, the QI coordinators were interviewed to gather information on plan activities not specifically covered in QIE reports, obtain updates on QI-related activities, and inquire on plan-specific concerns and access issues.

- **Attendance at QPI Workgroup meetings.** OMPRO attended the monthly meetings of the QPI Workgroup, a body working for the promotion and coordination of quality and performance improvement requirements and activities for health plans. The Workgroup meetings are active, and participatory; members demonstrate use of the Plan-Do-Study-Act (PDSA) cycle of improvement when possible.
- **Review of the following documents:**
  - **EQR reports for 1997–2002**[12,13,14,15,16]
  - **Health plan QIE reports for 2001–2003**
  - **Quality Improvement and Assessment Strategy** This document is required by CMS to ensure that OMAP administers quality measurement and improvement practices for the health plans serving OHP.[17]
  - **Oregon Health Plan Fully Capitated Health Plan Contract** (OHP-FCHP contract), dated October 1, 2004[18]
  - **OARs** concerning QI systems for OHP health plans[19]
  - **CMS EQR protocols**[20]
  - **Internal DHS and OMAP reports**, including
    - DHS Annual Performance Report, September 2003[21]
    - HEDIS® 2000 Performance Measures Report[22]

Inventory of QI Activities

The health plans, in partnership with OMAP and other healthcare organizations in the state, have engaged in QI activities around several topics in healthcare. The topics covered in this inventory are as follows:

- tobacco cessation
- early childhood cavities prevention (ECCP)
- childhood immunization
- prenatal care
- asthma
- diabetes
- depression
- racial and ethnic health disparities
- members with special healthcare needs
- other QI-related activities

Tobacco cessation

Tobacco cessation QI activities

Oregon has been hailed as a national leader by the Centers for Disease Control and Prevention (CDC) for its multifaceted approach to decrease tobacco use and thereby, tobacco-related illness and death. The Oregon Tobacco Prevention and Education Program (TPEP), a coordinated statewide public health effort, has played an important role in addressing nicotine dependence and nicotine cessation in Oregon. A 2001–2003 TPEP report shows Oregonians outpacing the national average in reducing tobacco use.[23] Overall cigarette consumption in 2004 was down by almost 30 percent from 1996, a far steeper reduction than in the rest of the nation. These results translate into savings for Oregon—almost $40 million a year in direct medical costs; with $10 million of these savings in costs for OHP members.

Although gains have been made in reducing the number of OHP members who use tobacco products, important opportunities for improvement remain. In 2002, 11.4 percent of live births in the United States were to smoking mothers; 12.6 percent of Oregon live births were to mothers who smoked during pregnancy; and OHP pregnant women smoke at a higher rate than both the national and state averages for pregnant women.[24] Smoking during pregnancy carries a high risk to the woman and the unborn child, including complications with, or premature, births; low-birth-weight babies; and early childhood disease.[25] For every dollar invested in smoking cessation for pregnant women, about $3 are saved in neonatal intensive care costs associated with low-birth-weight deliveries.[26]

In 1998, the OHP health plans began a statewide tobacco cessation project under Project: PREVENTION! With the assistance of TPEP and the Tobacco-Free Coalition of Oregon (TOFCO),[27] OMAP and the health plans constructed a comprehensive program promoting tobacco cessation, including a public awareness campaign for providers and OHP members, and promotion of the Oregon Tobacco Quit Line.[28] The specific goals of the statewide project were to

- provide outreach to increase the number of OHP members and providers who know that tobacco cessation is a covered benefit
- increase member access to tobacco cessation services
- target tobacco cessation services and education specifically to pregnant women and members with chronic disease

By 2003, 80 percent of the health plans had formally adopted guidelines consistent with the Public Health Services Tobacco Cessation Guidelines and incorporated smoking cessation measures into their QI programs.[29] That year, health plans chose to focus cessation efforts towards sub-populations of OHP members, including pregnant women and members with diabetes and asthma who smoke. Each health plan promoted smoking cessation in ways unique to the organization and its membership.

With focus on pregnant women, a few health plans worked collaboratively with MCM programs to offer tobacco cessation programs. Providence Health

Tobacco cessation QI activities

Plan, Central Oregon Individual Health Solutions (COIHS), and CareOregon cooperate with Smoke-Free Mothers and Babies, a DHS project that works with maternity case managers and prenatal care providers to incorporate the 5A's into cessation counseling and assist pregnant women in finding resources to quit.[30]

Several health plans noted the successful use of incentives to enroll women in MCM programs. For example, Oregon Health Management Services (OHMS) reports that starting a diaper incentive program resulted in a four- to five-fold increase in the use of MCM services by members. In 2004, MCMs were reaching about 80 percent of OHMS's pregnant members, and in turn, local obstetricians were receiving updates from the MCM program about their patients. For more examples of activities regarding supporting smoking cessation for pregnant women, see Appendix A, Tables A-1 and A-2.

Several health plans have begun to target smokers with chronic diseases, such as asthma and diabetes. InterCommunity Health Network (IHN), for example, is using the Diabetes Collaborative/DEMS protocol to identify members with diabetes who smoke and targeting cessation services accordingly.

All health plans update OMAP annually through Milestone Reports that detail program development and process measures and include quantitative indexes such as the number of members who receive cessation services, including pharmacotherapy, telephone counseling, and group counseling.

Early childhood cavities prevention

ECCP QI activities

Nationally and in Oregon, the incidence of early childhood cavities has reached epidemic proportions. In 1998, the Oregon Early Childhood Cavities Prevention (ECCP) Coalition and DHS identified early childhood cavities (ECC) as the most prevalent chronic disease affecting Oregon children particularly among low-income children. The ECCP Coalition's 1999 study showed that 50 percent of low-income Oregon children 24 months and younger were at high risk for ECC; between 18 and 36 percent of Oregon preschoolers had ECC; and 4 percent of preschoolers needed urgent care because of pain or systemic infections.[31] Furthermore, the costs associated with complications are significant, including hospitalization for restorative and surgical treatment.

Researchers have found that maternal oral health status is a significant determinant of early childhood caries.[32] Dental caries is a transmissible, infectious bacterial disease; researchers have proposed that periodontal infections are often transmitted from the mother to the child.[33] Evidence indicates that implementing programs to assess for, educate about, and treat ECC can significantly reduce ECC and associated conditions. Parent education and community programs have demonstrated a 38 percent decrease in ECC.[34] Pregnant women should also receive treatment for cavities to prevent colonization of dental flora to the infant.

At the time of its formation, the ECCP steering committee determined that oral health assessment, education, and treatment for ECC had not been routinely initiated in Oregon. Some physicians and nondental providers were unfamiliar with ECC as a disease, and unaware of important education and prevention messages, and effective treatment methods. A shortage of available dentists and the lack of an integrated infrastructure between health and dental care systems compounded the problem.

Recommendations from the Oregon EQR focused studies from 1998 to 2001 suggested that healthcare providers

- emphasize preventive measures
- develop and document a treatment plan (for children requiring restorative dental care)
- increase cooperation between medical and dental providers
- document examinations
- analyze patient records to establish causes for delays in initiation and completion of treatment, and eliminate them
- ensure that pregnant patients receive appropriate dental care

Empowered by EQR study results and the increasing visibility of pediatric oral health at state and federal levels, the health plans and dental care organizations galvanized their dental and healthcare systems around ECCP.

ECCP QI activities

Project: PREVENTION! Early Childhood Cavities Prevention (ECCP), was initiated as a PIP in 2000 to provide an organized process for healthcare providers to offer education, services, and referrals for pregnant women and children up to 24 months. The ECCP Coalition developed guidelines for enlisting physicians and other healthcare providers and conducted a pilot training session for providers in 2001. Since then, the ECCP Coalition has distributed guidelines to providers and professional organizations throughout the state, and provided training on ECCP to medical and dental providers and their staff. Health plans have disseminated information through newsletters, targeted mailings for pregnant women, information booths at community dental and health fairs, partnerships with local and county health department services, and the Internet. Project: PREVENTION! has also promoted

- collaboration among health plans, healthcare providers, and hospital Emergency Departments (EDs)
- distribution of dental referral information to clinics
- institution of referral forms

The ECCP project is monitored and evaluated through the health plan Milestone Reports. The 2004 reports show that 86 percent of the health plans have formally adopted the ECCP guidelines as the standard of care, and all have incorporated ECCP into their QI process.

In 2002, OMAP received a three-year grant from The Robert Wood Johnson Foundation for three health plans to improve access to oral healthcare services for low-income, disabled, and minority populations. With the infrastructure in place for ECCP activities, all three health plans have focused their efforts on ECCP systems development and improvement:

- CareOregon is collaborating with a local dental care organization to educate pediatricians on oral assessments of children and referrals to dental providers for cavity prevention services.
- COIHS is working with the county Women, Infants, and Children (WIC) program to integrate dental care for pregnant women and young children.
- Cascade Comprehensive Care, Inc. (Cascade) is working with community partners and healthcare organizations to enhance the infrastructure around preventive oral health services for OHP children and pregnant women.

In January 2005, OMAP staff presented quantitative data on ECCP indicators to the QPI Workgroup. The indicators were based on administrative data; survey data from the Pregnancy Risk Assessment Monitoring System (PRAMS) from 2000, 2001, and 2002; and CAHPS survey data from 2001 and 2003. The results showed that medical and dental providers did not increase assessments or advice on dental care for children up to 24 months. There were no increases in the percentage of assessments or cleanings for pregnant women. Although the percentage of women receiving advice on dental care increased, the percentage of women seeking care for dental problems also

increased. There is no standardized method for tracking referrals; health plans learned from their dental counterparts that medical providers are making few referrals to dentists.

Health plans have joined forces to identify the barriers to referrals and share best practices. One potential barrier is the lack of coordination between medical and dental providers. Also, health plans have discovered that members experience difficulties gaining access to pediatric and prenatal dental care because of the low number of pediatric dentists in a service area or the unwillingness of dental providers to treat pregnant women. One health plan, Marion Polk Community Health Plan (MPCHP), identified a lack of pediatric dentists in its service area as a barrier and subsequently incorporated oral assessments and the application of fluoride varnishes into the pediatric wellness visit.

ECCP QI activities

Childhood immunization QI activities

Childhood immunization

Oregon has one of the more advanced immunization registries in the United States. In 2001, Oregon received a national award from the Every Child By Two organization for the best use of registry data to improve public health.[35] This recognition was due, in part, to a collaborative effort among OHP health plans, the Office of Family Health, county health departments, and the Oregon Health Systems in Collaboration (OHSIC) to implement a statewide bar-code registry that records all of the immunizations a child has received from a variety of sources, and identifies vaccinations due but not yet received.[36] According to the 2003 National Immunization Survey, the current statewide immunization completion rate for two-year-olds is 76.5 percent.[37]

Between 1998 and 2003, the health plans measured children's immunization rates using the HEDIS Childhood Immunization Status measure for children up to 24 months old. This measure failed to reflect actual practices and provide usable information for health plans because of strict inclusion criteria for the HEDIS measure. Also, the childhood immunization measure was calculated using two different methods, which made it difficult to trend performance over time and compare performance across health plans.[38]

In 2004, OMAP and the health plans adopted new performance measures (PMs) based on the Advisory Committee on Immunization Practices (ACIP) standards. The new measures offer more flexibility for dose administration than the HEDIS measure, do not have continuous enrollment criteria, and are consistent with the Oregon Immunization ALERT registry algorithms and tools for improvement. The measures are calculated using ALERT immunization and administrative data, and include an all-inclusive measure (for children up to 36 months of age) and another measure for a steadily enrolled population (with less stringent enrollment parameters than the HEDIS measure).[39] The Oregon Immunization Program provides the health plans and OMAP with data for calculations of PMs and periodic reports to identify areas for aggregate as well as plan-specific improvement.

In early 2005, the initial calculations of the immunization measures were completed; these will be the baseline upon which to measure progress in future years. All health plans have been provided with lists of enrolled children who are not present in the ALERT registry. Also, four health plans—Tuality Health Alliance (Tuality), FamilyCare, Providence, and MPCHP—have agreed to participate in a pilot recall program using the ALERT registry to identify 19-month-old children not current on their immunizations and to bring these children up to date on their immunization status by the time they are 24 months old.

Prenatal care

Prenatal care QI activities

Prenatal care can have a significant impact on the health of the baby and on the mother's ability to take care of the infant. Appropriate prenatal care includes assessment of the risk of poor pregnancy outcome, providing health behavior advice, and managing preexisting and pregnancy-related medical conditions. Appropriate prenatal care can enhance pregnancy outcomes and long-term maternal health. Pregnant women should begin prenatal care visits in the first trimester of pregnancy. However, some women who become eligible for OHP as a result of pregnancy do not receive a first appointment until after the first trimester.

For these reasons, it is important that health plans monitor the timeliness of prenatal care and develop interventions to support pregnant women to get care as early as possible. In 1998, a Maternity Task Force examined the availability and accessibility of comprehensive maternal health care and recommended that OMAP include psychosocial supports and case management for pregnant OHP members, and that health plans begin to form cooperative partnerships with local county health departments in providing maternity case management.

A 1999 public-private partnership, Oregon MothersCare, promoted early prenatal care for all pregnant women in Oregon. Project stakeholders created a streamlined referral system to link women with pregnancy testing, prenatal care, OHP, WIC, and other pregnancy services. One of their strategies is to expedite pregnant women's applications for OHP eligibility. Since its inception, the program has expanded from sites in five areas to thirteen counties.[40]

From 1998 to 2003, all OHP health plans used the HEDIS Timeliness of Prenatal Care measure to evaluate prenatal care annually. In 2002, 71.5 percent of OHP pregnant members received an initial prenatal care visit within 42 days of enrollment or within the first trimester—a slight improvement over the 69.0 percent in 2000.

In addition, several OHP health plans have devised strategies for improving the early initiation of prenatal care. For example, Doctors of the Oregon Coast South (DOCS) and MPCHP have created incentives for providers to report pregnant members to the health plans so that the women could be targeted for prenatal care as early as possible.

Other health plans have increased member participation in comprehensive education programs through incentives for pregnant members. Mid-Rogue Independent Physician Association (MRIPA) and OHMS were among the first to create incentive programs to seek out and enroll pregnant women in county MCM services. MRIPA reported that since the Wee Wonder program started in January 2003, enrollment in MCM programs has increased from almost zero participation to 61 percent in 2004.

Several health plans also offer incentives for member participation in prenatal care programs. Providence offers MCM in their Beginnings program, which includes comprehensive risk screening; case manager assessments; member

Prenatal care QI activities

service plans; connections to resources, advocacy, education and written materials; and support throughout pregnancy, hospitalization, and discharge.

In 2003 the QPI Workgroup supported the decision to cease measuring prenatal care as a required PM in the OHP-FCHP contract because the HEDIS measure used to assess prenatal care was not providing information that could be used to improve care to pregnant women. The QPI Workgroup recommended adoption of asthma-related PMs instead of prenatal care.

Asthma

Asthma QI activities

Asthma is one of the more common chronic conditions in the United States. In 2001, asthma accounted for 1.9 million ED visits, and 4,269 deaths in the nation. In Oregon, the prevalence of asthma has increased dramatically. Data show that 8.1 percent of Oregon adults and 7.5 percent of Oregon children suffer from asthma.[41,42] The direct and indirect medical costs of this chronic condition are high: 1998 estimates indicate that asthma accounted for more than $125 million in direct and indirect costs in Oregon.[43] In addition, asthma disproportionately affects households with lower income levels. Findings from the 2004 Oregon EQRO Health Risk Health Status Survey Report of Results showed that 19 percent of adult OHP members reported that they have been diagnosed with, and still have, asthma—which is more than twice the prevalence for all Oregon adults.[44]

In 1996, the proportion of children receiving episodic primary care for this prominent, chronic childhood disease prompted an EQR focused clinical study of asthma among OHP members. The results showed that, despite consistently high rates of documented treatment plans and prescriptions for beta-agonists, performance in other quality indicators—such as the percentage of PCPs who provided education on the disease process or proper use of medications, or who administered influenza immunizations—varied widely among the health plans. The EQR identified room for improvement in providing lung examinations, recommending use of peak flow meters, assessing home smoking environments, documenting treatment response, and administering influenza immunization.

In 2000, the statewide Oregon Asthma Program was conceived with CDC funding to create a comprehensive public health surveillance system for asthma. In 2002, the program produced the Guide to Improving Asthma Care in Oregon to support continuous monitoring and improvement of specific processes of care.[45] The guide includes simple, focused, quality care recommendations with population-based indicators.

In 2001, the Asthma Data Workgroup (ADWG) was formed to help monitor the burden of asthma in Oregon, determine whether the data for the indicators in the Guide to Improving Asthma Care in Oregon were being collected, and to assist with data collection. The ADWG developed the *Technical Specifications for Quantifying Measures in the Guide to Improving Asthma Care in Oregon*, to provide guidance and assistance in analyzing data to make public health surveillance for asthma as comprehensive and informative as possible. The specifications were developed with the idea that a statewide set of measures will assist health systems, health plans, and clinics in monitoring the quality of asthma care. Simultaneously, the Oregon Asthma Program assembled summary information on these measures, to evaluate progress made implementing the recommendations from *The Guide to Improving Asthma Care in Oregon*.

In 2003, OMPRO received funds from the Oregon Health Care Quality Corporation to develop the Chronic Disease Data Clearinghouse. The purpose

Asthma QI activities

of the clearinghouse was to provide integrated health plan data about patients with diabetes and asthma in order to promote high quality, systematic care. The goal of the project was to enable participating physicians to see data for all current patients regardless of insurer. As of early 2005, eleven health plans submitted data identifying 62,634 patients with asthma.

Due to the rise in asthma prevalence and the variation in the management of asthma, the health plans, with the help of the ADWG, adopted asthma care as a new contractual PM. Beginning in 2004, health plans measured use of the ED and follow-up care for members with asthma, and the prescription of pharmacological agents.[46] As of the first quarter of 2005, the first set of asthma PMs had been calculated.

Several health plans are active in QI projects for their members with asthma. Two plans, Tuality and MPCHP, received grants from the Oregon Asthma Program to develop electronic tracking systems for members with asthma. Tuality identifies members with asthma using claims and pharmacy dispensing data, monitors ED use and hospital admissions, and notifies the primary care physician and specialists if follow-up care is needed. The QI project also tracked member medication use and influenza vaccinations. MPCHP identifies members with asthma using claims data. When a patient with asthma visits the ED, MPCHP notifies the patient's PCP. MPCHP also provides member education and case management. See Appendix A, Tables A-7 and A-8, for additional activities to improve care for health plan members with asthma.

Diabetes

Diabetes QI activities

Diabetes is a serious, chronic condition that can result in heart disease, blindness, amputation, kidney failure, and other debilitating or fatal conditions. In the United States, diabetes cost $44 billion in direct medical care in 1997 and accounted for an additional $54 billion in indirect costs from disability, work loss, and premature mortality.[47] In Oregon, diabetes is one of the more frequent hospital discharge diagnoses, and subsequently one of the more costly diseases. Almost 36,000 hospitalizations with any mention of diabetes cost Oregonians almost $380 million during 1999.[48] Currently close to 156,000 Oregonian adults have been told they have diabetes, and another 64,000 may have diabetes but not be aware that they have the disease.[49]

Among the OHP population, diabetes is particularly prominent. The 2004 Oregon EQRO Health Risk Health Status Survey showed that the prevalence of diabetes among adults in the OHP population is twice the prevalence among adults in the general population (12 percent for OHP compared with 6 percent for all Oregonians). For all age groups, the prevalence of diabetes in OHP members is consistently higher than in the general population.[50]

Because diabetes and risk factors associated with complications are more common in the Medicaid population, early diagnosis and treatment are important. Control of blood glucose levels and management of dyslipidemia are helpful in preventing long-term complications. Screening for diabetic retinopathy has long been recognized as integral to good care. Providing preventive treatment can effectively delay the onset, and slow the progression of, diabetic retinopathy, nephropathy, and neuropathy in people with diabetes.

The 1996–2000 EQR focused studies on diabetes provided information on member use of preventive services and self-management practices as well as provider practices. Although statewide performance in the quality indicators improved during the study period, room for improvement remained. Recommendations included improving early diagnoses; adherence to practice guidelines; providing screenings for alcohol, substance use, and depression; adopting checklists for care; providing education for providers and members; and incorporating quality indicators into all continuous quality improvement (CQI) activities.

In 1994, Oregon DHS, through an ongoing CDC grant, developed the Oregon Diabetes Program to reduce the burden of diabetes in Oregon. The activities of the program have focused on developing healthcare infrastructure and community resources, including a statewide diabetes morbidity and mortality surveillance system to track, measure, and monitor diabetes outcomes.

In 1999, the Oregon Diabetes Coalition, an organization that grew out of the Oregon Diabetes Program, published Oregon's Action Plan for Diabetes.[51] The primary goal articulated in the action plan was to increase the number of Oregonians with diabetes who received high-quality care from a responsible, accountable healthcare system. To that end, the Coalition disseminated evidence-based guidelines, which have been adopted for use by all of Oregon's health plans. Other Coalition activities include assisting healthcare providers

Diabetes QI activities

with infrastructure development to improve the level of preventive care service delivery and providing funds and technical assistance to help local county health departments develop community-based assessment projects.

In 1999, the health plans adopted the HEDIS Comprehensive Diabetes Care measure as a PM for the 2000–2001 OHP-FCHP contract. This nationally accepted measure is a composite index of six aspects of diabetes care that evaluate how well an MCO cares for its members with diabetes.[52] In 2002, OMAP and the health plans suspended the measure to allow time for interventions to be implemented and to reduce the administrative burden on the health plans.

The Oregon Diabetes Collaboratives, sponsored by OMPRO, were another effort to increase awareness of diabetes and diabetes care. The Collaboratives promoted system changes by applying the evidence-based Chronic Care Model.[53] Providers for several health plans participated in the Collaboratives to learn and implement an organizational approach to caring for people with diabetes in a primary care setting. Integral to the process was the development of a registry of people with diabetes who were tracked for the duration of the project. The outcomes measured on a monthly basis included patient HbA1c control level, low-density lipoprotein (LDL) cholesterol control, and patient self-management goal setting.

Although diabetes care is not an ongoing OMAP-sponsored area of evaluation for the health plans, several health plans have initiated activities around management for their OHP members. Five health plans had providers participating in the second Oregon Diabetes Collaborative. InterCommunity Health Network (IHN) has implemented the diabetes registry database for all of its providers and formalized a diabetes management program. Several plans provide education about diabetes through targeted informational mailings to members and have referred members to local classes. Three health plans have tracked their efforts and activities with the intended outcomes of improving their HEDIS Comprehensive Diabetes Care Measures and decreasing hospitalizations and ED visits for diabetes-related reasons.

As of March 2005, providers had submitted data to the Chronic Disease Data Clearinghouse, a repository for claims data from multiple health plans for people with diabetes and asthma. The clearinghouse will supply a single, unified report with diabetes care data from all participating plans to providers. Stakeholders anticipate that the clearinghouse will provide valuable information for health plans and providers in managing diabetes.

Depression

Depression QI activities

Depression is one of the more common chronic illnesses in the United States, with high morbidity, mortality, and economic impact. In 1990, depression was the fourth leading cause of major disability. In 2005, approximately 19 million adults in the United States will experience a depressive disorder; major depressive disease is already the number two cause of disability in females. More than half of depressed patients never seek medical attention and suffer devastating outcomes with regard to quality-of-life issues or suicide.[54,55] Researchers estimate that the disability experienced by those with depression, and the economic burden of the disease, will be second only to the burden of coronary artery disease by the year 2020.[56]

Treatment for depression in the United States is more fragmented than the care of other chronic illnesses, creating a major gap between recommended guidelines and the care provided. Some of the challenges providers experience with depression care include underdiagnosis, financial disincentives, and requirements for special treatment based on patients' inability to manage their own care.[57] Of equal importance in the care of depressed patients is the assessment of the patient's risk for suicidal behavior. It is estimated that 19 percent of people with depression in the United States who see their primary care provider receive appropriate, guideline-based care.[58]

Three years of EQR depression quality-of-care studies found that weaknesses in depression care in Oregon are similar to the weaknesses in care found at the national level. Focused studies from 1999 documented the use of any type of depression rating scale at 8 percent for adults and 13 percent for adolescents. Guidelines suggest that the desired goal for performing a suicide risk assessment is 100 percent, but the 1999 study revealed documented suicide risk assessments in 42.7 percent of the adult records and 59 percent of adolescent records.

In 2000, a CQI project was initiated by OMAP and the health plans to address two key components of depression treatment—administration of a depression rating scale tool for patients, and documentation of a suicide risk assessment. A subgroup of the Contractors' QI Workgroup was convened to encourage the use of a self-rating tool on patients diagnosed with depression and to re-administer the same rating scale at key decision points during treatment. The committee also found that the groundwork had been laid for CQI activities on depression across several healthcare disciplines. For example, the Multnomah County Health Department disseminated tools for care in Oregon, including protocols for depression recognition and care management.

Several OHP health plans put the depression tools into practice and initiated efforts to improve the quality of depression care. FamilyCare has worked with their contracted mental health organization in the Portland metropolitan area to educate providers on depression. Protocols for depression recognition and management, screening forms, and patient educational materials were distributed to primary care providers. FamilyCare's members also received information on depression in member handbooks and newsletter articles.

Depression QI activities

CareOregon promoted the use of the Patient Health Questionnaire (PHQ-9)™ self-rating tool covering the nine signs and symptoms of depression in the *Diagnostic and Statistical Manual of Mental Disorders, Fourth Edition* (DSM-IV) and a treatment database to improve care management.[59] CareOregon saw a marked increase in the number of diagnosed cases after implementation of the system.

In addition, CareOregon was one of three health plans to receive OMAP grant money to undertake a project on case management for members diagnosed with depression. The project goal was to improve depression recognition and care management, including medication management, in primary care pilot sites. CareOregon's multidisciplinary project team worked with participating health and mental health clinics to increase consultation among PCPs, clinical pharmacists, and mental health professionals. Clinical pharmacists provided pharmacy consultation to help patients improve medication management. CareOregon created a fully integrated database of its metropolitan Portland members to support medication management, particularly antidepressant medication utilization. Through the database, providers for CareOregon were able to gather enrollment and demographic information for members who had been prescribed mental health medications. Lane Individual Practice Association (LIPA) and COIHS were the other two recipients of monies.[60]

Racial and ethnic disparities

Racial and ethnic disparities QI activities

The issue of racial and ethnic disparities in medical care has received a great deal of attention in the past several years. The Institute of Medicine report, *Unequal Treatment: Confronting Racial and Ethnic Disparities in Healthcare*, concluded that Americans in racial and ethnic minorities "tend to receive lower quality of health care than non-minorities, even when access-related factors, such as patients' insurance status and income, are controlled."[61] The 2004 National Health Disparities Report found significant disparities in the provision of evidence-based preventive services for certain populations. For example, people in racial and ethnic minorities and those below a certain income level are less likely to receive screening and treatment for cardiac risk factors. The lower screening levels and gaps in delivery for effective treatment of risk factors (such as smoking among the uninsured) point toward opportunities for QI initiatives that could potentially reduce disparities in heart disease care among the populations at risk.[62]

The Medicaid managed care rules address the requirements by which states must abide with regard to ethnic and minority members and potential members. states must identify the race, ethnicity, and primary language spoken by each member and must provide this information to the health plans. To ensure equitable dissemination of information to all members, the state must establish a methodology for determining the prevalent non-English languages spoken by a significant percentage of potential and current members in the state. Each health plan is required to

- make written information available in each prevalent language
- make oral interpretation services available free of charge for all non-English languages
- notify members that interpretation services are available
- provide information on ways of accessing interpretation services

One of Oregon DHS's priorities is reducing health disparities by 50 percent by 2005 and to zero percent by 2010.[63] DHS recognizes that eliminating health disparities among racial and ethnic groups is a key departmental PM, one of 25 reported in the DHS *Annual Performance Report*. OHP health plans are required to provide services, including education, community outreach, and partnerships that are culturally appropriate and programs that identify and meet the unique needs of the diverse population.[64] OMAP has used administrative data to track OHP members' access to primary care, comparing white members with members in all other racial and ethnic groups.[65] The measure shows the percentage of members who received at least one primary care visit during the year by race and ethnicity. OMAP has tracked this proportion for several years; between 2002 and 2003 the data showed a slight decrease in disparity.[66]

Examining racial and ethnic disparities is a priority for OHP QI activities as well. The fall 2003 statewide Quality Improvement Conference highlighted the

Racial and ethnic disparities QI activities

issue of disparities across racial and ethnic groups. The EQR studies for 2003–2005 evaluated ethnic and minority health differences, including a special CAHPS report devoted to differences in health status and health care for certain ethnic groups represented in OHP.[67] The 2004 Medicaid Health Risk Health Status Survey[68] oversampled members in certain ethnic groups to ensure statistically valid comparisons of health behaviors and risk factors across racial and ethnic categories.

Although health plans are required to monitor the ethnic makeup of their members, few plans have ethnic or minority groups in significant numbers to support focused programs. All health plans have translation services for their non-English-speaking members. Most have member materials translated into other languages, if the demographic makeup of the membership requires. The CAHPS 2003 survey measured availability of translation services to members, asking whether the respondent had needed interpreter services in the past six months, and whether interpretation was available.

In October 2004, OMAP was awarded a grant by the Center for Health Care Strategies with funding from The Robert Wood Johnson Foundation and The Commonwealth Fund. OMAP was one of 12 organizations selected to participate in the initiative, Improving Health Care Quality for Racially and Ethnically Diverse Populations. The goal of the program is to develop and test innovative strategies to address healthcare quality for racially and ethnically diverse populations in Medicaid managed care. Three health plans with a history of working together to reduce healthcare disparities for African American members (CareOregon, FamilyCare, and Providence) are participating in the initiative. OMAP is working with all health plans to improve care for Hispanic members with asthma and diabetes.

Members with special healthcare needs

Members with special needs QI activities

OHP health plans are required to provide specialized case management services called Exceptional Needs Care Coordination (ENCC) to all "aged, blind, or disabled" members, consistent with the provisions in the Oregon Administrative Rules (OARs).[69] ENCC services include

- early identification qualifying members and children with special healthcare needs[70]
- coordination of care with providers to
  - ensure unique needs are identified and met in treatment planning
  - coordinate services and discharge planning
- assistance to members to ensure
  - timely access to providers and capitated services
  - coordination of community and social service systems support
- facilitation for complaint resolution related to these members

Children with special healthcare needs (CSHCN) are defined by the federal Maternal and Child Health Bureau as "those who have…a chronic, physical, developmental, behavioral or emotional condition and…require health and related services of a type or amount beyond that required by children generally." Identifying CSHCN is important because families in poverty experience a higher rate of disabilities. Approximately 3.5 percent of children on OHP are blind, disabled, or in foster homes. In 2000, 70 percent of children visited by nurses from a statewide care coordination program that provides public health nursing services were OHP members.[71,72]

OMAP and two health plans have developed a definition of CSHCN that is specific to Oregon, using ICD-9-CM codes for children younger than 19 years and CSHCN screening tools. One of the CSHCN screening tools was developed through a collaborative process coordinated by the Portland-based Foundation for Accountability (FACCT). The screening tool is a five-item survey of parents that uses non-condition-specific, consequence-based criteria to identify CSHCN.[73]

Most health plans use several methods to identify members in need of ENCC services. At a minimum, all plans send out information to the newly enrolled members who meet the ENCC criteria on the availability of ENCC services. Most health plans identify members who need care coordination through provider referral, referral by state agencies, or utilization review. Four plans use a health risk assessment survey that allows new members to identify themselves as in need of ENCC.

The ENCC coordinators participate in regional OHP meetings and case conferences involving their affected members. The staff who provide ENCC services are sensitive to the unique healthcare needs of this population. Each ENCC coordinator receives training in communicating with those with exceptional needs.

Other QI-related activities

In addition to the topics and activities described above, several ongoing activities were key elements of the state Quality Assessment and Improvement Strategy:

- EQR and EQR-related activities
- quality improvement evaluations (QIE)
- annual QI reports[74]

These activities are required by state or federal law, or by the OHP-FCHP contract. In many cases these activities overlap, complement, or reinforce the activities already described.

Other QI-related activities

EQR and EQR-related activities

External quality review (EQR) is the analysis and evaluation of aggregated information on the timeliness of, quality of, and access to the healthcare services that a health plan provides to Medicaid recipients.

The 2003–2005 EQR contract between OMAP and OMPRO was established prior to the effective date for compliance with the EQR component of the Medicaid managed rules. Although the PMs and PIPs of the health plans incorporate many of the principles and concepts in the CMS EQR protocols, OMPRO did not formally assess the PMs and PIPs according to the protocol criteria, but rather, used the protocols as guidelines. In addition, OMPRO's contract with OMAP specified several optional EQR activities, as listed in the CMS EQR protocols. Table 1 lists the optional activities and indicates whether OMPRO, as the EQRO, used information from the optional activity in its 2003–2005 review.

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The 2003–2005 EQR contract between OMAP and OMPRO incorporated surveys of Medicaid recipients (CAHPS 3.0 and the Oregon Medicaid Health Risk Health Status Survey)[75, 76] and providers (2004 Oregon Physician Workforce Survey),[77] an evaluation of chronic illness management[78] and statewide QI activities (this report), and five clinical and nonclinical comparative assessments on the following topics:

- ED utilization[79]
- access to care[80]
- diabetes care[81]
- asthma care[82]

cardiovascular care[83]

Table 1. Optional EQR-related activities and information used for the 2003–2005 EQR contract cycle.

Optional EQR-related activity	Information used during 2003–2005 EQR contract cycle
Encounter data validation	Yes
Administration or validation of consumer surveys of quality of care	Yes
Administration or validation of provider surveys of quality of care	Yes
Studies on quality that focus on a particular aspect of clinical or nonclinical services at a point in time	Yes
Chronic disease management chart review	Yes

Consumer and provider surveys

Other QI-related activities

The surveys were administered to gather primary data from the perspective of OHP members and physicians in Oregon. The overarching goals of the surveys were to provide feedback to the health plans and OMAP that can be used in comprehensive QI initiatives.

- The CAHPS 3.0 Adult and Children Medicaid Surveys are standardized surveys that assess member perspectives on care. The CAHPS ratings and measures allow for comparisons across all OHP health plans.
- The Health Risk Health Status Survey was administered to adult OHP members to assess the OHP population's health status and behaviors that affect health status.
- The 2004 Oregon Physician Workforce Survey was part of an ongoing effort to collect information from all licensed Oregon physicians on specific workforce issues. Focal areas included physician acceptance of Medicaid as a payer, concerns about providing care to Medicaid patients, and awareness of OHP-covered benefits and statewide resources.

Comparative assessments

The comparative assessments examined five areas selected by OMAP and health plan medical directors at the beginning of the EQR contract period. The comparative assessments were part of a rapid cycle process in which

- OMPRO analyzed the data for evidence of health plan variation.
- OMAP and OMPRO shared the findings with the health plans.
- OMPRO followed up with health plans to discuss opportunities for improvement and produce a comparative assessment report.

OMPRO evaluated health plan performance through a series of rapid cycle studies that analyzed measures derived from administrative and encounter data. The purpose of rapid cycle studies was to provide high-level results that can be applied more quickly than results obtained through a formal research analysis.

The findings of the five comparative assessments have been used in conjunction with data and information gathered in other EQR activities to provide a comprehensive evaluation of each health plan's performance. In future EQR contracts, formal validation protocols, the integration of compliance monitoring, and the required EQR technical report will be incorporated into the scope of EQRO responsibilities.

Other QI-related activities

QI evaluations

OMAP QI coordinators perform periodic assessments of health plans' QI programs and compliance with stipulations of the OHP-FCHP contract, and state and federal regulations. These assessments combine desk audits with site visits. The QI evaluations provide an opportunity to follow up with individual plans on compliance or quality issues identified earlier, check on progress in addressing those areas, recognize good performance and best practices, and identify improvement goals for the following period.

Between 2003 and 2005, the frequency of these evaluations was decreased from once a year to every three years to lessen the administrative burden on health plans. As of first quarter 2005, OMAP was in the process of revising its assessment tool and process to incorporate the structure required by federal statute.

Annual QI reports

Each year, the health plans produce a QI report that includes information on QI projects in clinical and nonclinical areas and provides a self-evaluation of the overall effectiveness of their QI program. OMAP uses the QI report to check that health plans are in compliance with federal and state regulations. In addition, the QI report serves as an opportunity for OMAP to

- provide feedback and guidance to assist the health plans in future QI program evaluations
- help health plans achieve compliance with new federal guidelines regarding QI in managed care

A review of the 2003 annual reports showed that an objective and consistent assessment was difficult due to variation in reporting by the health plans. For example, evidence-based clinical guidelines adopted by each plan were mentioned sporadically or not at all in some reports. In response, the OMAP QI staff and the health plan QI coordinators developed a review tool to standardize the process and incorporate QI standards and requirements from the federal Medicaid managed care rules, the state OARs, and the OHP-FCHP contract to ensure that all areas would be addressed by the health plans. The 2003 round of reports was retrospectively deemed a pilot year because the review tool was developed after the health plans submitted their reports.

For 2004, additional details from the OMAP review tool were added to the health plan report template to ensure that health plans provided the specificity of information required. Additionally, guidelines for reporting were developed and included with the template.

Assessment

This assessment is OMPRO's evaluation of the PIPs and PMs that OMAP and the health plans conducted during the 2003–2005 review cycle:

- **Performance improvement projects**
  - OHP Tobacco Cessation Project
  - early childhood cavities prevention (ECCP)
- **Performance measures**
  - asthma
  - childhood immunization

The OHP health plan PIPs and PMs evaluated in this assessment were conceived, designed, and implemented before the criteria embedded in the CMS EQR protocols had become mandatory. For this review, OMAP directed OMPRO to perform an assessment of PMs and PIPs using the criteria listed in the CMS EQR protocols as guidelines.

The results of this assessment, in combination with the regulations and standards articulated in the CMS EQR protocols, can aid in the planning and design of future PIPs and PMs.

Performance improvement projects

OHP health plans were engaged in two PIPs during the 2003–2005 review cycle, the OHP Tobacco Cessation Project and the early childhood cavities prevention (ECCP) project. Both projects were rooted in collaborative public health programs and initiated by several healthcare organizations, including OMAP and the health plans. Detailed information about initial project efforts can be found in the Inventory of QI Activities that begins on page 9.

OMPRO assessed each PIP by several key criteria:

- study topic reflects population needs
- study population is clearly defined
- study question is clearly defined
- study indicator is objective and measurable
- data collection process is clearly defined; data are valid and reliable
- improvement strategy is clear and designed to change performance based on the quality indicator
- assessment of results is clear and accurate

In the section that follows, each detailed criterion is followed by OMPRO's assessment of how well the execution of the PIP adhered to the criterion.

OHP Tobacco Cessation Project

Tobacco cessation PIP

The tobacco cessation project is a statewide initiative undertaken as part of Project: PREVENTION! to focus on tobacco cessation efforts within the OHP population. The program design is similar to a public health campaign in which MCOs have the flexibility to implement a range of interventions that support the project's goal of increasing OHP members' access to smoking cessation services. For a detailed description of the tobacco cessation project, see the Tobacco Cessation section of the Inventory of QI Activities, beginning on page 11.

Study topic reflects population needs

The topic must reflect the demographics, prevalence of diagnoses, potential risks, or service needs of the OHP population. The topic should be determined through systematic selection and prioritization. The selected topic must aim to improve care and services for a large portion of the OHP population.

A review of care provided to OHP members during the first year of the OHP highlighted that fewer preventive services were being provided than were deemed necessary by plan medical directors and OMAP management. Because prevention is a critical basis of an effective delivery system, an integrated and targeted effort was put into place with the suggestion and consensus of plan medical directors. This focused effort was ultimately intended to improve the delivery of managed healthcare services to OHP members and to save costs by decreasing the need for unnecessary acute care services. Information from several sources contributed to the decision to focus on prevention:

- EQR findings from 1994–1995 identifying prevention as an area below expectations
- priorities from *U.S. Preventive Services Guide* and health plan medical directors
- policy focus and initiatives in prevention and quality of life initiated by former Governor Kitzhaber [84]
- ideas from health plans for prevention improvement

Although state statistics show that there is much room for improvement in smoking cessation efforts, the rationale for selection of tobacco cessation as a statewide QI activity has not been well documented.[85] To fully meet the criteria, OMAP and the health plans could include a discussion of other possible topics and the rationale for prioritizing smoking cessation over other preventive efforts, with particular focus on documenting the reasons for continuing this project as a statewide activity each year.

Tobacco cessation PIP

Study population is clearly defined

The study population should be defined clearly to include all OHP members who are eligible. If the study population is an "at risk" subpopulation, the risk and the subpopulation should be clearly defined as well as the rationale for selecting the subpopulation.

The tobacco cessation project targets all members who smoke, especially pregnant women and members with chronic disease. Although the target OHP population is all eligible members (i.e., smokers), the methods for identifying smoking members, pregnant women, and members with chronic disease are not defined in the state's work plan.[86]

Study question is clearly defined

Study questions must be stated clearly to create a framework for data collection, analysis, and interpretation.

The project work plan includes three distinct tobacco cessation project objectives; each creates a framework for data collection, analysis, and interpretation in support of the overall goal:

- conduct a statewide, coordinated information campaign to improve OHP provider and member awareness that
  - behavioral and pharmacologic assistance in quitting is a covered benefit
  - the Oregon Tobacco Quit Line is a good resource for getting help[87]
  - receiving assistance in quitting increases the likelihood of successfully quitting, or, in the words of the campaign, "help helps"
- increase the number of OHP smokers who receive cessation assistance by helping all health plans provide a high level of service
- decrease the prevalence of smoking in pregnant women ages 14–44 and people with diabetes, asthma, COPD, and cardiovascular disease through education materials and intensive cessation assistance. Begin the chronic disease focus with asthma or diabetes.

Each of these objectives could be recast as a distinct study question; for example, "Would helping all health plans provide tobacco cessation services increase the number of OHP smokers who obtain cessation assistance by ____ percent?" The CMS EQR protocol recommends that study questions avoid broad terms such as "high level of service" in order to state the study problem in clear, simple, answerable questions.

Tobacco cessation PIP

Study indicator is objective and measurable

The project plan should include an indicator statement that clearly identifies the eligible population, the care or service being evaluated, and the specific care or service time frame. Indicators must be objective, measurable, clearly defined, unambiguous statements of an aspect of quality to be measured. The indicators must be capable of measuring member outcomes or satisfaction, or processes of care strongly associated with improved member outcomes.

The tobacco cessation project work plan listed several objectives for outreach, increasing member access to services, and supporting tobacco cessation in the target population of pregnant women ages 14–44.[88] Each objective also delineated the data sources that would provide the improvement information:[89]

- **Improve provider and member awareness.** This objective is measured by three distinct data sources:
  - Medicaid Behavioral Risk Factors Surveillance System (BRFSS) survey[90]
  - Oregon Tobacco Quit Line reports
  - provider survey

  The indicators are clearly stated, such as the BRFSS measure of the proportion of OHP smokers who know that cessation assistance is an OHP covered benefit. The physician workforce survey is discussed as a remeasurement of provider knowledge of OHP-covered benefits; OMPRO recommends tracking physician awareness over time through follow-up surveys.[91]
- **Increase access to services.** Baseline measurements have been chosen, and plans to measure the progress of the health plans have been clearly stated. Health plans measured their progress through annual Milestone Reports, reporting
  - the percentage of their smoking members using pharmacologic cessation assistance, or behavioral cessation assistance
  - the percentage of their members who have been mailed resources about obtaining cessation services
- **Decrease the proportion of smoking members among pregnant OHP women and OHP members with chronic disease.** The data source for measuring progress with pregnant OHP women is the Oregon birth certificate data. There is no indicator or any baseline measurement for OHP members who smoke with diabetes, asthma, chronic obstructive pulmonary disease (COPD), or cardiovascular disease. Possible sources for data on these sub-populations are the Medicaid BRFSS survey and health plan administrative data.

Tobacco cessation PIP

Data collection process is clearly defined; data are valid and reliable

The data collection process must ensure that data to be collected, the source of the data, and method of collecting are clearly specified. Data elements should be unambiguous. Descriptive terms (e.g., "high," "medium," "low") should be defined numerically. Data sources should be clearly identified with time frames specified. The study design should describe a systematic method of collecting valid and reliable data on the population to which the indicators apply.

The OHP-FCHP contract includes requirements for collecting PIP data. In most cases, for the indicators discussed above, the data sources are identified, but there appears to be no systematic method for collecting the data, except through the annual Health Plan Tobacco Cessation Program Progress Milestone Reports.

Data collection using a survey instrument is contingent on many factors including the schedule for administration, sampling methods, and response rates. If BRFSS data is used, for example, OMPRO recommends that the survey be regularly administered, that sufficient numbers of OHP members be included in the survey sample, and that populations be compared over time.

In addition, OMPRO recommends better definition of the process for reviewing Oregon Tobacco Quit Line reports, including designating one person responsible for extracting the pertinent OHP data from the reports. Similarly, one entity should be charged with reviewing Oregon birth certificate data to ascertain the smoking prevalence of pregnant women.

A definition of numerator and denominator for the indicator to measure smoking prevalence among members with chronic disease should be developed, including articulating a process for data collection process. The tobacco cessation project work plan can partially meet this criterion by referencing other documentation in which the data plans are spelled out, and a schedule for periodically reviewing data reports in the context of evaluating improvement should be included in the work plan.

The Milestone Report is an example of documentation of the data collection process. Each health plan submits an annual Milestone Report[92] to update OMAP on its activities and progress in fostering tobacco cessation. The Milestone Report has three sections:

- a checklist of processes undertaken to ensure that the health plan incorporated smoking cessation into its QI process.[93] The checklist requires health plans to report in four key areas: policy and planning, QI, communication, and clinical delivery systems.
- an update of tobacco cessation activities and interventions since the prior year. The focus of this section is on OHP providers, and on target populations such as OHP members who smoke, pregnant women, and those with diabetes, asthma, COPD, and cardiovascular disease.
- a request for submission of data for members receiving pharmacological smoking assistance and/or counseling, based on standards defined by OMAP

Tobacco cessation PIP

Although the process for submitting Milestone Reports is clear, the quantitative and qualitative information that health plans must submit could be more clearly defined. For example, the request for an update of activities is presented as an open-ended request, leaving the level of detail and specificity at the discretion of the health plans. As a consequence, health plans varied in the level of detail they provided; some specified the number of mailings they made to providers and the number of charts reviewed, while others stated that they provided an unspecified number of mailings and sponsored clinics.

During the discussion of results from the 2004 Milestone Reports, plans discovered that the data they submitted was not standard across all plans. Some health plans counted the number of dispensings for pharmacotherapy, while others counted the number of members who received pharmacotherapy assistance. The quantitative data on cessation aids requires better definition and standardization to support plan-to-plan comparisons.

Improvement strategy is clear and designed to change performance based on the quality indicator

An improvement strategy is defined as an intervention designed to change behavior at an institutional, practitioner, or beneficiary level. The effectiveness of the intervention activity or activities can be determined by measuring the change in performance, according to predefined quality indicators. Interventions should be timed to effect change after the baseline measurement and prior to remeasurement, be effective in improving the indicator for the population studied, reasonably expected to result in measured improvement, and be free of confounding variables likely to affect outcomes. If repeat measures of QI indicate that actions were not successful, i.e., did not achieve significant improvement, the problem-solving process begins again with data analysis to identify possible causes, a proposal, and implementation of solutions.

A key focus for the tobacco cessation project has been increasing adult OHP members' access to smoking cessation services. Increasing members' access is dependent on several related factors:

- medical provider knowledge of smoking cessation techniques and the 5A's cessation intervention
- provider and member awareness of the available, covered cessation services
- provider and member understanding of how to access tobacco cessation services

Several of the health plans have addressed tobacco cessation outreach and access to services, as well as targeted pregnant women and members with chronic disease for services in ways that were unique to the mix of providers and enrolled members.

An improvement strategy was laid out for objectives with a specified indicator. For example, although the goal was set to increase the percentage of OHP members who knew about smoking cessation services as a covered benefit

Tobacco cessation PIP

from 34 percent to 50 percent, a time frame for this improvement was not established in the work plan. The strategy could be improved by specifying a time frame to meet the goal, and addressing particular interventions designed to change performance based on this indicator. Health plans, at varying levels of intensity, are trying to change member awareness of available services through mailings, new member handbooks, and materials available in providers' offices. If additional interventions have been proven to increase awareness of services, OMPRO recommends that they be included in the project design.

Because multiple interventions and measurement approaches were used and variables were not controlled, the impact of specific interventions on member utilization of tobacco cessation services, and on smoking prevalence, cannot be directly attributed.

Assessment of results is clear and accurate

The study results, including numerical results and qualitative findings, need to be presented in a manner that provides accurate, clear, and easily understood information. The results should identify baseline and remeasurement data, the statistical significance of the results, and any explanation of factors influencing comparability and validity of the data. It should be clear from the study that the reported improvement represents "real" change and is not due to a short-term event unrelated to the intervention or is not due to chance. To support the argument that the interventions caused real change, the analysis should include documentation of quantitative improvement in processes related to the study question and improvement in associated outcomes of care. It also should state clearly how the interventions relate to the improvement in performance. Finally, the analysis should include an appropriate calculation of statistical significance, with a discussion of the test used to calculate significance.

Milestone Reports were reviewed by OMAP staff and summarized for presentation to the health plan QI coordinators. The qualitative data were presented in the *Milestone Summary, OHP Tobacco Cessation Program* report[94] which outlines the activities that each health plan undertook during the year. The quantitative report—which included data from the most recent CAHPS survey, Oregon Tobacco Quit Line reports, and health plan-submitted data on member use of cessation services—was presented in the form of tables and graphics and allowed for a plan-to-plan comparisons. However, the Milestone Summary report did not make reference to the baseline measurement or demonstrate any trending over time to allow for statistical comparisons. The report did not mention possible circumstances that may have limited comparability among health plans, such as inconsistencies in data collection and reporting.

Additional data regarding promoting smoking cessation were frequently presented at the QPI Workgroup meetings. OMAP presented results for the 2003 CAHPS smoking-related questions by health plan.[95] Although comparisons were made with previous CAHPS results, the 2003 analysis did not address statistical significance, make any observations about changes over time, nor did it imply that any changes resulted from the PIP interventions.

Tobacco cessation PIP

Biennial surveys may not be the most accurate indicators to detect improvements in behavior changes for two reasons: the survey population of members is not constant, and any changes that occur cannot be attributed to specific interventions. In addition to CAHPS data, OHP smoking-related data are presented in the form of a Dashboard Report, comparing data for the OHP population with the state and nation. Although the Dashboard Report provides state and national benchmarks, it does not provide data at the health plan level.

ECCP PIP

Early childhood cavities prevention (ECCP)

The ECCP project is an initiative undertaken as part of Project: PREVENTION! The program design for the ECCP project is similar to that of a multi-pronged public health campaign in which several different interventions are implemented simultaneously to support the project's goal of early prevention of, education regarding, and treatment of cavities in pregnant women and in children ages 0–24 months. For a full description of the ECCP project and its background, see The ECCP section of the Inventory of QI Activities, beginning on page 13.

Study topic is clearly defined

The topic must reflect the demographics, prevalence of diagnoses, potential risks, or service needs of the OHP population. The topic should be determined through systematic selection and prioritization. The selected topic must aim to improve care and services for a large portion of the OHP population.

In 1998, ECCP Coalition, OHP dental plans, OMAP, and DHS Family Health Services identified cavities as the most prevalent chronic disease in Oregonian children. At that time, Project: PREVENTION!, a statewide prevention initiative on tobacco cessation was being launched. The OHP health and dental plans made a joint decision to focus the next OHP statewide prevention initiative on the prevention of early childhood cavities.

As outlined in the May 2002 project update document, multiple factors contributed to the selection of ECCP as a project topic.[96] The project came about as early childhood cavities was becoming recognized as an infectious disease reaching epidemic proportions in Oregon. The Oregon ECCP Coalition had agreed to partner with OHP health plans by providing educational materials and training. In addition, early childhood cavities prevention was being recognized on a federal level. The May 2000 Surgeon General's Report[97] confirmed that caries is the single most common chronic disease in children. Pediatric oral health PMs were under development by CMS and the National Committee for Quality Assurance (NCQA). In January 2001, CMS issued a letter requiring states to identify and submit a plan of action to improve children's access to oral health services.[98] Finally, Oregon had begun to focus on developing its own benchmarks for pediatric oral health which catalyzed the selection of ECCP as a PIP.

Study population is clearly defined

The study population should be defined clearly to include all eligible OHP members. If the study population is an "at risk" subpopulation, the risk and the subpopulation should be clearly defined as well as the rationale for selecting the subpopulation.

The study population is clearly defined as pregnant women and children ages 0 to 24 months. OMAP sends lists of pregnant female members to the respective health plans each month to enable the plans to target this population for dental visits.

Study question is clearly defined

ECCP PIP

Study questions must be stated clearly to create a framework for data collection, analysis, and interpretation.

The focus of the project is on prevention, early assessment, and education for pregnant women and young children. Although no one study question was explicitly articulated, the design of the project lends itself to the broad question, for example, "Would establishing guidelines, disseminating provider training, and creating partnerships between dental and medical providers increase early assessment and prevention of ECC for young children and pregnant women by ___percent? The CMS protocol recommends that study questions be simple and answerable, therefore this study question may be too broad.

Study indicator is objective and measurable

The project plan should include an indicator statement that clearly identifies the eligible population, the care or service being evaluated, and the specific care or service time frame. Indicators must be objective, measurable, clearly defined, unambiguous statements of an aspect of quality to be measured. The indicators must be capable of measuring member outcomes or satisfaction, or processes of care strongly associated with improved member outcomes.

The monitoring and evaluation work plan delineates several measures for documentation of care, recording health plans' progress, and implementation of a continuous quality improvement (CQI) process.

Documentation of care. Health plans were to document the following elements of care:

- oral health assessments given
- education information or advice rendered
- member's need for treatment
- dental referrals and treatments given

The documentation was measured through encounter data and EQR chart audits for pregnant women and for children ages 0 to 24 months. Current Dental Terminology (CDT) and Current Procedural Terminology (CPT) codes were identified for each of the measures. The measures were clearly stated and specified the eligible population with regard to pregnancy status, age, enrollment, and service criteria.

Recording health plan progress. The Milestone Reports measure plans' consistent progress in developing their ECCP programs. This measure was reported on the OHP-wide level as well as plan-specific level. The rationale behind this measure was to monitor plans' program development and efforts toward contributing to the statewide initiative, and at the same time, allow for varying stages of development. The results should have identified areas in which plans needed technical assistance.

ECCP PIP

Although the section of the Milestone Report that focuses on program development is largely objective, the definition of "consistent progress" is may be interpreted differently by each health plan. A clearer, better-defined measure would be, for example, the percentage of health plans that have met all parts of policy, planning, and QI development within their health plans.

Full integration of PIP into health plans' CQI process. The health plans aimed to achieve full integration of the ECCP program into their existing CQI process, as determined by OMAP QIE site reviews. This measure is intended to be reported among all health plans. Although the measure specifies that full integration requires collecting baseline data, creating change interventions, and monitoring, the definition of "full integration" needs more specificity.

Data collection process is clearly defined; data are valid and reliable

The data collection process must ensure that data to be collected, the source of the data, and method of collecting are clearly specified. Data elements should be unambiguous. Descriptive terms (e.g., "high," "medium," "low") should be defined numerically. Data sources should be clearly identified with time frames specified. The study design should describe a systematic method of collecting valid and reliable data on the population to which the indicators apply.

The process for collecting data for ECCP needs clear definition. The frequency with which the data are to be collected has not been specified. The baseline measurement years varied with the measure, and it was not clear whether measures were to be phased in over the course of the project or whether data for the measures were to be collected annually. Also, the description of the EQRO chart audit process needs more definition, including the frequency with which the charts will be audited and the scope of the audit.

The data were collected annually from the Milestone Reports and every three years during QIE site visits. Each health plan submitted an annual Milestone Report, a self-reported progress report to update OMAP on its activities and progress fostering early childhood cavities prevention. The Milestone Report for this PIP had two sections:

- a checklist of processes undertaken to ensure that the health plan has incorporated ECCP into its QI process. This section did not have to be completed once a health plan had demonstrated completion. The checklist required health plans to report in four key areas: policy and planning, QI, communication, and clinical delivery systems. In addition, health plans had to briefly describe the ECCP project experience in the previous six months, including highlights such as processes, methods, training, or incentives that had proven successful.
- an update of ECCP activities and interventions since the last submission in the prior year. The focus of this section was on health plans' interactions with OHP providers and members, specifically providing training and tools for providers, and facilitating communication with, and providing education for, members.

ECCP PIP

Although the process for submitting Milestone Reports was clear, the quantitative and qualitative information that the health plans must submit could be more clearly defined. For example, the request for an update of activities was presented as an open-ended request, leaving the level of detail and specificity to the discretion of the health plans. The Milestone Report requires plans to indicate whether goals and improvement monitoring methods have been established, but the templates did not request details of health plan goals or monitoring methods. Plans were required to report whether they had implemented a process for providing feedback to providers and staff about oral health advice and the effectiveness of provider education, but the template did not require plans to discuss how provider effectiveness was measured, or the nature of the feedback to providers.

As a consequence, health plans varied in the level of detail they provided; some specified the percentages of pregnant women and children who received preventive services; some reported that they disseminated educational materials to providers and members without providing a great deal of detail about the outreach efforts.

The measures against which health plans will be evaluated need to be defined in discrete, measurable elements. Terms like "consistent progress" and 'full integration" are not quantifiable and thus, subject to interpretation.

Improvement strategy is clear and designed to change performance based on the quality indicator

An improvement strategy is defined as an intervention designed to change behavior at an institutional, practitioner, or beneficiary level. The effectiveness of the intervention activity or activities can be determined by measuring the change in performance, according to predefined quality indicators. Interventions should be timed to effect change after the baseline measurement and prior to remeasurement, be effective in improving the indicator for the population studied, reasonably expected to result in measured improvement and be free of confounding variables likely to affect outcomes. If repeat measures of QI indicate that actions were not successful, i.e., did not achieve significant improvement, the problem-solving process begins again with data analysis to identify possible causes, and propose and implement solutions.

The implicit strategy of the ECCP project was to increase documentation by medical and dental providers of assessments, advice, member need for treatment, referrals, and treatments given, and to have all health plans incorporate ECCP into their CQI activities. The underlying belief of the program was that training medical and dental providers in ECCP and preventive care would increase assessments, advice, and preventive treatments for young children and pregnant women over time. These ECCP efforts may not have been reflected in yearly measurements of claims data or chart reviews, particularly at the inception of the project, because measuring behavioral change takes time. Although plans have established baselines and collected remeasurement data for one year, continuing remeasurement in subsequent years is recommended.

ECCP PIP

Assessment of results is clear and accurate

The study results, including numerical results and qualitative findings, need to be presented in a manner that provides accurate, clear, and easily understood information. The results should identify baseline and remeasurement data, the statistical significance of the results, and any explanation of factors influencing comparability and validity of the data. It should be clear from the study that the reported improvement represents "real" change and is not due to a short-term event unrelated to the intervention or is not due to chance. To support the argument that the interventions caused real change, the analysis should include documentation of quantitative improvement in processes related to the study question and improvement in associated outcomes of care. It also should state clearly how the interventions relate to the improvement in performance. Finally, the analysis should include an appropriate calculation of statistical significance, with a discussion of the test used to calculate significance.

In January 2005, OMAP presented the ECCP findings to the health plans, using quantitative data derived from measures that diverged from the measures established at the outset of the project. Administrative data and the results from the CAHPS and Pregnancy Risk Assessment Monitoring System (PRAMS) surveys showed no discernible increases in assessments or advice for children or pregnant women in OHP. There had been an increase in the percentage of female OHP members receiving advice on dental care. Whether this increase was statistically significant and could be attributable to specific interventions could not be established. The project began as a public health campaign rather than as a PIP, and measures were not formulated according to the OMAP PIP specifications.

Performance measures

Two performance measures (PMs) are assessed in this section:

- asthma care
- childhood immunization

In the evaluations of PMs, OMPRO adapted many of the criteria from the CMS protocol, *Validation of Performance Measures*.[99] The adapted criteria were formulated as two evaluation questions:

- Has the state specified the measure to be calculated? Are there specifications for calculating the measure? Is the manner and mechanism clear for reporting the data?
- Can OMAP and the health plans use the PM results to monitor their performance over time and to compare their performance with that of other health plans in Oregon?

The assessment of each PM includes a brief description of the measure, a reiteration of the evaluation questions, and OMPRO's findings.

Some of the CMS EQR protocol criteria were not used for the evaluation questions because the scope of the current EQR contract did not require a formal review. For example, an information systems capability assessment—an integral aspect of the full validation protocol—was not conducted as part of this evaluation. The completeness and accuracy of the measures were not assessed nor was the degree to which the PMs conform to all of the protocol specifications for PMs.

Asthma

Asthma care PM

The OHP health plans chose asthma care as a PM in the first quarter of 2004 to replace the HEDIS prenatal care measure. The Asthma Data Workgroup (ADWG), part of the Oregon Asthma Program, assisted OMAP and the OHP health plans in developing original PMs appropriate for the OHP population and meaningful to the health plans that manage them. The measures are as follows:

- **ED visits and follow-up care.** Percentage of OHP members with asthma who have an ED visit with asthma as the primary diagnosis; and percentage of those with a follow-up visit within 30 days.
- **Medications.** Percentage of members with persistent asthma who received
  - 1 or more daily inhaled anti-inflammatory medications
  - more than 6 short-acting bronchodilator (standard rescue medication) dispensings
  - more than 6 short-acting inhaled bronchodilator canisters or nebulizer (enhanced rescue medication) dispensings

The measures that were developed allow for initial, or baseline, measurement as well as identification of areas for improvement. The PM should also lend itself to the performance improvement process.

Has the state specified the measure to be calculated? Are there specifications for calculating the measure? Is the manner and mechanism clear for reporting the data?

The state has specified in the OHP-FCHP contract the asthma care measure that health plans are required to submit annually.[100] Health plans are required to "follow the data collection and reporting methodologies according to standards set in the Oregon Asthma Data Workgroup Technical Specifications developed for the QPI Workgroup."[101] OMAP has also developed a summary sheet for the 2003 data measurement that outlines

- indicators comprising the asthma care measures and intended results
- the rationale for choosing asthma care as a PM
- the reporting period
- eligibility criteria for inclusion[102]

The calculation of the measures involves data pulls by both OMAP and the health plans. OMAP provides each health plan with a plan-specific data set for the denominator for the measure. The ADWG has prepared a document of technical specifications for each health plan to calculate the numerators.[103] A disk containing the technical specifications, denominator, submission form, and the drug codes used for the asthma PMs was provided to each plan. Oregon Asthma Program staff also conducted site visits to ensure that health plan staff were clear on the instructions and to troubleshoot problems if necessary.

Asthma care PM

OMPRO recommends that OMAP document the data calculation and reporting process in a format similar to a work plan format, which would include objectives, detailed descriptions of the measures, expected outcomes, and a plan for assessing results. Similarly, a written process should be created for measurement quality control that addresses data analysis and reporting, including the parties responsible for each phase of the process; templates for data collection and reporting; and programming specifications that include data sources, programming logic, and computer source code.

Can OMAP and the health plans use the PM results to monitor their performance over time and to compare their performance with that of other health plans in Oregon?

The goal of performance measurement is to accurately assess current performance so that better results can be achieved through focused improvement actions. Performance measurement benefits the health plan by providing statistically valid, sound data using a data system that generates a continuous stream of performance information. This enables health plan staff and administrators to understand how well they are doing over time and to maintain objective data. Using objective data, plans can verify the effectiveness of corrective actions, identify areas of excellence within the organization, and make comparisons with other plans.

Asthma as a PM is in its early stages. To fully meet the definition of a PM, the plans and OMAP must develop specific goals for improvement after reviewing the baseline measure results. OMAP and the plans must set expectations for subsequent annual remeasurements. Examples of goals could be to

- decrease variation among health plans toward a weighted health plan average
- use commercial health plan performance levels as benchmarks
- increase or decrease results by a certain percentage

As of early 2005, plans had received results based on one year of data for the ED visit/follow-up care and the medications measures. Discussions of a benchmark for all health plans, or individual plan goals, have been absent; it is not clear how the plans will measure improvement over time. PMs should allow health plans to compare their performance with that of other plans. The data should be sound, or reproducible, routinely verified for accuracy and consistency. Comparisons between health plans should be statistically valid.

Performance measurement and remeasurement should lead to coordinated strategies toward improvement. The Oregon Asthma Program document of technical specifications[104] indicates processes for calculating the PMs that can be coordinated with performance improvement strategies. The method of identifying members with asthma, based on service and pharmacy utilization, can be used to populate an asthma registry.

Childhood immunization

Childhood immunization PM

OHP health plans have reported on PMs for childhood immunization status since 1998. Beginning in 2004, the PMs were revised from the HEDIS® measure to a measure more appropriate for the Medicaid population. The Oregon Immunization ALERT registry, part of the DHS Immunization Program, has been integral in assisting health plans in performance improvement processes, including calculating the revised PM.

Has the state specified the measure to be calculated? Are there specifications for calculating the measure? Is the manner and mechanism clear for reporting the data?

The OHP-FCHP contract contains specifications for the childhood immunization status that health plans are required to submit on an annual basis.[105] The contract specified that OMAP would collect immunization data from the ALERT registry. Immunization rates were calculated using standards created by the Advisory Committee on Immunization Practices (ACIP).[106] OMAP and Immunization ALERT followed the standard data collection and reporting methodologies developed by ACIP, the QPI work group, and OMAP.

OMAP has also prepared a summary sheet of the measurement process for the health plan QI coordinators that includes

- clear descriptions of the denominators and numerators for both the inclusive and steadily enrolled measures
- a timeline for the measurement year
- a description of the parties responsible for each phase of the process[107]

The process has been clearly mapped out for the 2003–2005 evaluation cycle. Documentation requirements for future PM validation should include appropriate and complete measurement plans and programming specifications that include the data source, programming logic, and computer source codes.

Can OMAP and the health plans use the PM results to monitor their performance over time and to compare their performance with that of other health plans in Oregon?

To fully meet the definition of a PM, the plans and OMAP need to establish baseline measurement(s), set expectations for subsequent annual remeasurements, and develop specific goals for improvement. The initial 2004 data could serve as the baseline measurement. OMAP and the health plans need to

- determine how to measure improvement based on the annual calculations from the ALERT registry data
- define the changes that indicate improvement

For example, improvement can be defined as reducing variation in a positive direction among all health plans, or as a fixed percentage-point increase in the

Childhood immunization PM

measure. In the future, performance measurement and remeasurement can lead to coordinated strategies toward improvement. Determination of the improvement strategy will dictate the follow-up actions that health plans can take over time.

PMs should allow plans to compare their performance with that of other plans. Therefore, the data should be sound, or reproducible, and comparisons should be statistically valid. Health plans have the option of submitting claims data to populate the ALERT registry. Because there can be time lags with claims processing, the validity of the data used to calculate the PM should be verified routinely. Although differences among plans may appear to be substantial, statistical tests may prove otherwise.

From the first year of measurement, improvement strategies are already in progress. OMAP has targeted health plans whose child members do not have any immunization records in the ALERT registry and is following up with plans whose child members were not current on their immunization schedules. The Oregon Immunization Program has several tools to assist providers and plans in improving immunization rates, such as the Assessment, Feedback, Incentives and eXchange (AFIX) tool. In addition, health plans can use the data from ALERT to identify OHP children who are 19 months old and not current on their immunizations. Four health plans, FamilyCare, MPCHP, Providence, and Tuality, have committed to calling the caregivers for these children with a reminder that the children should be up to date on immunizations by the time they are 24 months old. This pilot effort will yield data to help OMAP determine whether a timed reminder improves childhood immunization rates.

Discussion

OMPRO assessed the health plan QI programs, projects, and all statewide QI activities using study criteria related to several topics:

- members' needs, care, and services
- key aspects of care, such as quality, access, and cultural competence
- existing data sources
- high-risk or high-prevalence, clinical and nonclinical areas
- project mission, goals, objectives, measures, and tasks
- information on race and ethnicity
- areas for improvement
- best practices

Table 2, beginning on page 57, shows each topic area, the criteria related to the topic, and activities that fulfill the criteria. The left column lists each topic in bold, followed by the relevant criteria. The right column is a descriptive list of the programs, projects, and activities that fulfill the criteria.

Table 2. QI programs, projects, and activities that fulfill assessment criteria, by topic.

Members' needs, care, and services are addressed	
Encompass a broad reach in terms of the demographic characteristics.	• Statewide QI activities focus on women and children, a large proportion of the OHP population. • ED utilization and access to care comparative assessments analyzed the entire OHP population for the study period. • The CAHPS and Health Risk Health Status survey samples oversampled some racial and ethnic groups to enable comparisons across groups.
Address prevalence of conditions or diseases and the potential consequences of not intervening.	• Statewide QI activities include a focus on smoking rates among OHP members and the disease burden of chronic smokers. • HRHS survey analyzed the prevalence of certain chronic diseases and conditions. • Diabetes, CVD, and asthma comparative assessments discussed potential consequences of not intervening.
Key aspects of care, such as quality, access, and cultural competence are addressed	
Address quality of care.	• Statewide activities focus on improving the quality of medical and dental care. • Asthma PM measures the percentage of follow-up visits after an ED visit. • The asthma and CVD comparative assessments compared acute admission rates for all qualifying of OHP members to national benchmarks. • The evaluation of the management of chronic disease assessed care for a sample of OHP members with asthma or diabetes. • HRHS survey measured provider assistance and instruction on self-management of chronic diseases, respondents' perceived access to their provider, and healthcare services. • 2004 Oregon Physician Workforce Survey measured physician awareness of smoking cessation resources, and use of resources. • CAHPS measured frequency with which physicians advised OHP members who smoke to quit and offered assistance to them. • CAHPS measured members' perceptions of communication with providers and office staff.

Table 2. QI programs, projects, and activities that fulfill assessment criteria, by assessment topic, continued.

Address access to care.	• ECCP PIP focuses on increasing referrals to dental providers for women and children. • Tobacco PIP focuses on increasing knowledge and use of smoking cessation resources. • Childhood immunization PM tracks children's receipt of immunizations. • ED comparative assessment focused on enrollees' utilization of services. • Access to care comparative assessment focused on members' time to first encounter and type of first encounter. • 2004 Oregon Physician Workforce Survey evaluated availability of providers by physician specialty and geographic region.
Address cultural competence.	• Health plans provide translation services to members as well as translation of member materials into common non-English languages. • CAHPS measures the ease of communication experienced by members with their provider.
Existing data sources	
Eligibility and enrollment data are used.	• Enrollment and administrative data are used to determine continuous enrollment for PIPs and PMs. • Enrollment and administrative data are used to identify population for comparative assessments.
Service data, i.e., hospital and pharmacy data, are used.	• Hospital and pharmacy data are used to identify members with asthma for the asthma PM. • Hospital data are used to identify ED use and follow-up care in the asthma PM. • Pharmacy data are used to identify dispensings for asthma medications and nicotine replacement therapy for quitting smoking. • Inpatient hospital claims data were used for the asthma, diabetes, and cardiovascular care, and access to care comparative assessments. • Outpatient claims data were used for the access to care and diabetes comparative assessments.

Table 2. QI programs, projects, and activities that fulfill assessment criteria, by assessment topic, continued.

Member surveys are used.	• CAHPS data were used to determine smoking prevalence. • HRHS survey was used to measure the disease burden and behavioral risk factors for certain chronic diseases and conditions.
Diagnosis data and registry databases are used.	• ALERT registry data were matched to administrative data to analyze child immunization rates. • Diagnosis data were used for most comparative assessment measures. • Diagnosis data were used to identify the sample for the evaluation of the management of chronic disease.
High-risk, high-prevalence, and clinical and nonclinical areas	
High-risk conditions addressed.	• Tobacco cessation PIP targets smoking cessation; smoking is a risk factor for most chronic diseases. • ECCP PIP targets young children and pregnant women to promote access to preventive dental services and dental treatment. • Asthma PM measures follow-up care after an asthma-related ED visit; uncontrolled asthma can be life-threatening. • CVD care comparative assessment measured acute inpatient admission rates for CVD and compared rates for the OHP sample with national population.
High-prevalence conditions addressed.	• Tobacco cessation PIP targets smoking cessation for OHP clients; OHP enrollees smoke at higher rates than the general adult Oregon population. • ECCP PIP targets cavities in children; cavities are a condition that disproportionately affects low-income households. • Asthma PM addresses asthma, a condition that is more prevalent in the OHP population than the in general adult Oregon population. • Diabetes comparative assessment evaluated diabetes quality of care; diabetes is more prevalent among a sample of OHP members than among the general Oregon population.

Table 2. QI programs, projects, and activities that fulfill assessment criteria, by assessment topic, continued.

Address clinical and nonclinical areas.	• PMs address clinical topics through improvement of the nonclinical processes around obtaining care. For example, the asthma PM reflects members' ability to get follow-up care after an asthma-related ED visit. • PIP interventions are designed to improve access to care for clinical topics. For example, the focus of the ECCP project is to prevent cavities among infants and pregnant mothers through improving the dental referral process. • Comparative assessments addressed member utilization of services for ED and ambulatory care. • Evaluation of the management of chronic diseases measured documentation of, and outcomes from, processes of care.
Mission, goals, objectives, measures, and tasks	
Goals and objectives are defined.	• Tobacco cessation PIP increases access to health care by promoting the use of smoking cessation services; ECCP PIP promotes the use of oral health services by young children and pregnant women. • Childhood immunization PM and prenatal care QI activities improve the quality of health care and receipt of preventive services for children and pregnant women, respectively. • The EQR comparative assessments, surveys, and chart reviews assessed plan variation in providing access to appropriate, quality health care for OHP members.
Measures and tasks are defined.	• Measures and tasks for PIPs have been defined, but could be improved and brought into full alignment with the specifications outlined in the CMS EQR protocols. • Performance measure calculations have been standardized to improve comparability among plans.

Table 2. QI programs, projects, and activities that fulfill assessment criteria, by assessment topic, continued.

Information on race and ethnicity	
Meaningful information on race and ethnicity is provided.	• CAHPS and HRHS surveys oversampled for nonwhite and Hispanic groups to compare differences by race and ethnicity. • OMAP and selected health plans collaborated on the Center for Health Care Strategies initiative: Improving Health Care Quality for Racially and Ethnically Diverse Populations.
Areas for improvement	
Areas for improvement are identified.	• Annual QI report and periodic QI evaluations identify areas for improvement. • QPI Workgroup reviews of annual PIs and PMs result in opportunities for improvement. • EQR comparative assessments, surveys, and chart review identified areas for improvement on statewide and plan level.
Best practices	
Best practices are used.	• PIPs incorporate evidence-based methods, such as the 5A's for tobacco cessation, and "lift the lip" for ECCP. • The asthma PM is derived from national asthma guidelines. • QPI Workgroup meetings and biennial workshops provide opportunities for demonstrations of best practices. • Comparative assessment used national guidelines as a benchmark for diabetes care.

Conclusions and Recommendations

OMAP's attention to quality has been a prominent feature of its administration of the OHP. OMAP has committed substantial resources to ensure and improve the quality, timeliness, and access to health care for OHP members. Oregon DHS has fostered collaborative and coordinated efforts to support this commitment through

- monthly QPI Workgroup and medical director meetings
- semiannual statewide QI workshops
- QI coordinators dedicated to working with each health plan
- specific efforts such as performance measurement, QIE, and EQR
- programs coordinated with public health agencies that affect OHP members

Providing quality of care and access in a cost-effective manner in the face of decreasing funding has been a predominant theme of all these activities.

The OHP health plans are committed to QI and involved in the state-sponsored activities and development of individual QI programs. Some health plans have also invested substantial resources in support of other community-based improvement efforts, such as the Oregon Diabetes Collaborative.

There is strong evidence that the topics, measures, and opportunities for improvement have been identified using data, systematic approaches, and consensus decision making. The approaches to QI tend to be implicit rather than explicit, and the rationale for adopting QI processes do not appear to be well understood by all parties. This may contribute to confusion among health plans about how topics are selected, who selects them, why some topics are selected over others, and how and why transitions between activities occur. In addition, QI efforts appear to be inconsistently practiced across time and topics.

The challenge for OMAP will be to create a coordinated QI program that incorporates all of the required elements in a systematic fashion that leads to CQI. Different improvement activities were designed to achieve statewide improvement through different means. For example, PIPs target measurement and intervention techniques on identified improvement opportunities, and the calculation of PMs provides feedback and comparison data that can indicate the need for, and provide the motivation for, improvement. Many of the specific methods and tools are transferable from activity to activity. The CMS EQR protocols provide evidence of this complementarity. Articulating a clear study question and employing precise technical specifications, such as robust sampling and data collection methods, are two of the desirable (though not always practical) methods of idealized activity design outlined in the CMS EQR protocols. Future mandatory validation audits will evaluate PMs and PIPs for this level of rigor.

OMAP should consider the following strategies as it moves into full implementation of its quality assessment and improvement activities:

Structure state-sponsored QI activities to support the design and implementation of valid PIPs and PMs at the health plan level. This will facilitate successful EQR validation of plan-based QI activities for those topics and activities for which participation is contractually mandated by the state. OMAP has encouraged broader adoption of the Plan-Do-Study-Act (PDSA) cycle approach to PIPs.

An example of a system design at the state level that would facilitate creation of valid PIPs is a structure such as the Breakthrough Series model developed by the Institute for Healthcare Improvement.[108] Under this model, healthcare organizations such as health plans test multiple changes (i.e., interventions in the vernacular of the CMS EQR protocols) that may lead to improvements, using linked PDSA cycles. In this model, the overarching aims (goals) are shared. Indicators—or measures—may vary from plan to plan, depending upon the aspect of the processes to be addressed. The defining feature of the Breakthrough Series model is that the approach to planning, testing, and measuring changes is systematic and intentional.

In an adaptation of this approach, health plans might be asked to complete standardized forms for planning, testing, and implementing changes. This would help each plan to think through the elements of a successful change (e.g., objectives of the change, questions and predictions, measures, and test design). At monthly QPI Workgroup meetings, each plan would follow the standardized format to report to the other members of the work group. When the test was completed, plans would report on the results, the lessons learned, and actions planned for the next cycle. Health plan PDSA cycles could even be synchronized in selected topics to facilitate parallel learning.

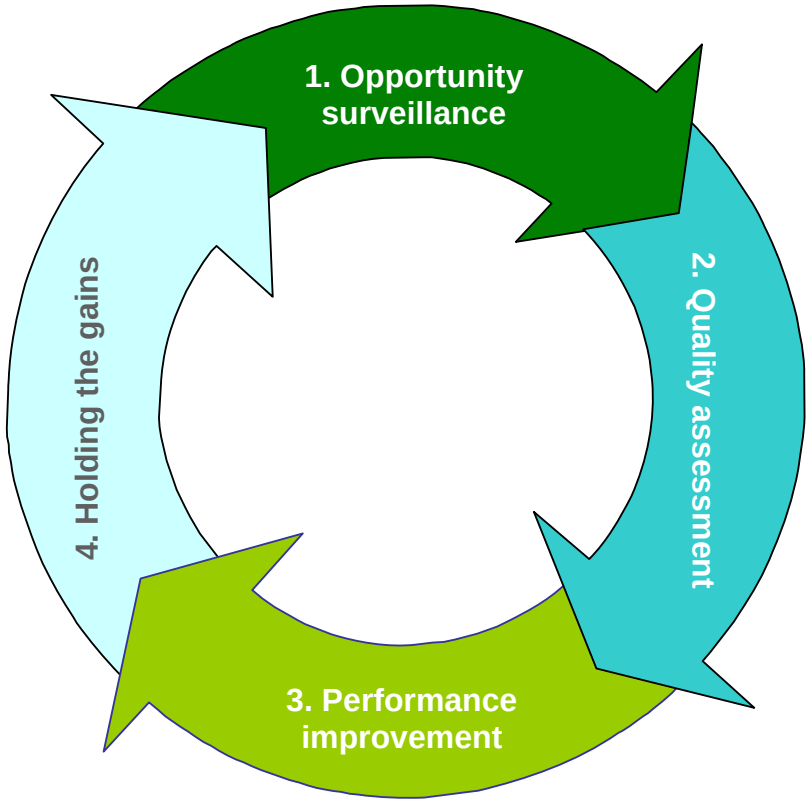
Consistently articulate and reinforce standardized, valid, reliable data collection. In addition to clear aims, precise study questions, and objective measures, a standardized set of data collection tools will enhance comparability and the validity of findings. Quantifiable measures and indicators provide the most useful information for assessing the rate of improvement, but measures of adherence to structure and process standards also provide a basis for comparison, if the data are consistently collected. This is particularly true when programs are in a developmental stage. Other performance assessment and improvement programs have established that easily accessible technical assistance that provides consistent advice is a best practice in achieving standardized, valid data collection.

Continue coordination of managed care structure and operation standards and train and monitor health plans for consistent application of standards. The benefit of mandatory monitoring is that it will help to ensure that plans have the necessary infrastructure to conduct valid QI activities. Consistent interpretation and application of standards by the state is imperative to ensure that this monitoring activity has credibility and benefit for the plans.

Designate a lead expert to serve as interpreter and consultant. A frequent complaint of health plans undergoing EQR audits and other forms of compliance monitoring is inconsistent application of standards by reviewers. One of the OMAP QI coordinators with expertise in the managed care standards should serve as an internal consultant to the other team members and program staff as well as to plan QI personnel. This expert could be "on-call" to staff in the field, be responsible for monitoring updates and information from CMS and other states, serve as "process owner" of the compliance monitoring and standards promulgation, and provide education and training to OMAP and health plan staff.

Articulate a framework for linking QI activities to each other and to the overall Quality Assessment and Improvement Strategy. The purpose of such a framework is to provide a "critical path" showing the relationships between activities and the logical rationale for identifying and prioritizing opportunities for improvement, defining inputs and desired outcomes, and sequencing activities over time. A framework would also facilitate coordination of annual planning and review, and QI-related contract requirements. Figure 2 illustrates a potential organizational framework for principal statewide QI activities.

1. Opportunity surveillance
Use existing data sources available at the statewide level to broadly identify opportunities for improvement.



2. Quality assessment
Use focused assessments, such as EQR studies, to evaluate more specific factors in the OHP population. Use plan-specific data to determine whether improvement is necessary on a statewide level or at the plan level.

3. Performance improvement
Implement targeted interventions with clear aims, objectives, and measures to set an acceptable threshold for improvement.

4. Holding the gains
Monitor results to ensure that improvements can be maintained through plan-specific performance measures. If results are consistent, the frequency of monitoring can be decreased. If performance deteriorates, the plan can move through steps 2 and 3 again.

Figure 2. A framework for quality improvement.

The framework consists of four phases linked in cyclical fashion:

5. Opportunity surveillance
6. Quality assessment
7. Performance improvement
8. Holding the gains

Phase 1: Opportunity surveillance. This phase takes advantage of existing data sources at the statewide level. Several sources have already been collected through public health surveillance activities. These may be specific to OHP or the general population. Examples include

- infant mortality and low-birth-weight statistics
- hospital discharge data
- disease-specific statistics
- CAHPS results
- Behavioral Risk Factor Surveillance System
- Health Risk Health Status Survey
- 2004 Oregon Provider Workforce Survey
- fair hearings requests

These population-based statistics, many at the outcome level, can help to identify overall trends that may signify opportunities for improvement. For example, an increase in infant mortality in at-risk populations may be an indicator of declining prenatal care. If trends are identified, topics should be researched further, evaluated for applicability, and prioritized before advancing to phase 2.

Phase 2: Quality assessment. In the second phase, focused assessment methods such as EQR focused studies and OMAP's Rapid Cycle Improvement Process evaluate specific factors (e.g., prenatal care, childhood immunizations, ED utilization) that may contribute to the outcome of concern.[109] The information is specific to OHP members and programs, and the data are analyzed at the state aggregate and plan-specific levels. This step helps to confirm or rule out factors that could influence statewide trends. Individual health plan results help to identify opportunities for improvement best addressed at the plan level, through a coordinated statewide effort, or some combination of both approaches. Health plan performance is an explicit consideration at this phase. Outlying performance can be identified for follow-up and targeted improvement efforts if necessary. Best practices can also be identified and disseminated during this phase.

Phase 3: Performance improvement. In phase 3 the results of the quality assessment phase are used to direct targeted interventions through large- and small-scale PDSA cycles. Examples at the statewide level include participation in a Breakthrough Collaborative or a state-coordinated public health campaign.

Individual health plans with improvement opportunities would implement QI efforts during this phase as well. Compliance monitoring efforts complement this phase by helping to ensure that the plans have the needed infrastructure to carry out valid PIPs. For both small and large scale PDSA cycles, clear aims, objectives, and measures should be set to identify an acceptable threshold for improvement. When acceptable improvement has been achieved, efforts on the focal topic can be advanced to phase 4, making room for another topic that has been identified through phases 1 and 2.

Phase 4: Holding the gains. In phase 4, intermediate-term monitoring is conducted to ensure that the improvements realized in phase 3 are maintained. The monitoring relies on the OHP-specific PMs identified in phase 3 that are routinely collected by the health plans and/or OMAP. These measures are ideally based on industry standards, or are developed, tested, and validated during the preceding phases. If performance deteriorates, the plan can return to phase 1 or 2 for further improvement work. If measures hold steady, the state may then opt to lengthen intervals between measurements, or to shift back to monitoring at the population (i.e., phase 1) level.

The use of this framework would help link many elements of the state's Quality Assessment and Improvement Strategy in a logical sequence and provide a predictable basis for changing health plan QI contract requirements to meet priorities at the time of renewal. The framework allows for immediate implementation at any phase in the cycle and elevates QI planning to a strategic (three- to five-year) time frame, providing flexibility while assisting OMAP and the health plans in "staying the course" of QI in the midst of turbulent times.

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List of Acronyms and Abbreviations

Acronym or abbreviation	Word or phrase
ACIP	Advisory Committee on Immunization Practices
ADA	American Diabetes Association
ADWG	Asthma Data Workgroup
AFIX	Assessment, Feedback, Incentives, eXchange
ALERT	Oregon Immunization Alert
BRFSS	Behavioral Risk Factors Surveillance System
CAHPS	Consumer Assessment of Health Plans (formerly)
CareOregon	CareOregon, Inc.
Cascade	Cascade Comprehensive Care, Inc.
CDC	Centers for Disease Control and Prevention
CDT	Current Dental Terminology
CMS	Centers for Medicare & Medicaid Services
COIHS	Central Oregon Individual Health Solutions
COPD	chronic obstructive pulmonary disease
CPT	Current Procedural Terminology
CQI	continuous quality improvement
CSHCN	children with special healthcare needs
DCIPA	Douglas County Independent Physicians Association
DCO	dental care organization
DEMS	diabetes electronic management system
DHS	Department of Human Services
DOCS	Doctors of the Oregon Coast South
ECC	early childhood cavities
ECCP	early childhood cavities prevention
ED	Emergency Department
ENCC	exceptional needs care coordination
EQR	external quality review
EQRO	external quality review organization
FACCT	Foundation for Accountability
FamilyCare	FamilyCare, Inc.
FCHP	fully capitated health plan
HbA1c	glycosolated hemoglobin
HEDIS	Health Plan Employer Data and Information Set
HRHS	Health Risk Health Status
ICIC	Improving Chronic Illness Care
IHI	Institute for Healthcare Improvement
IHN	InterCommunity Health Network
IOM	Institute of Medicine

Acronym or abbreviation	Word or phrase
Kaiser	Kaiser Permanente Northwest
LDL	low-density lipoprotein
LIPA	Lane Individual Practice Association
MCM	maternity care management
MCO	managed care organization
MPCHP	Marion Polk Community Health Plan
MRIPA	Mid-Rogue Independent Physician Association
NAEPP	National Asthma Education and Prevention Program
NCQA	National Committee for Quality Assurance
OAP	Oregon Asthma Program
OARs	Oregon Administrative Rules
OHMS	Oregon Health Management Services
OHP	Oregon Health Plan
OHSIC	Oregon Health Systems in Collaboration
PDSA	Plan-Do-Study-Act
PIHP	prepaid inpatient health plan
PIP	performance improvement project
PM	performance measure
PRAMS	Pregnancy Risk Assessment Monitoring System
Providence	Providence Health Plan
QAPI	quality assessment and performance improvement
QIE	quality improvement evaluation
QPI Workgroup	Quality and Performance Improvement Workgroup
TOFCO	Tobacco-Free Coalition of Oregon
TPEP	Tobacco Prevention and Education Program
Tuality	Tuality Health Alliance
U.S.	United States
WIC	Women, Infants, and Children

Appendix A. Program and Health Plan Quality Improvement (QI) Activities

The tables in this section provide detailed descriptions of QI activities related to the topics covered in the report. The tables of statewide QI activities list the specific project name, a brief description, the funding source and time frame, a list of program activities or measures, and the participating health plans. Additional information about internal health plan QI activities by health plan is provided. This appendix comprises the following tables:

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Table A-1. Statewide tobacco cessation QI activities.

Project name	Description	Funding	Time frame	Program activities	Participating health plans
Project: PREVENTION! Tobacco cessation	This is one of the current statewide performance improvement projects with participation by all Medicaid health plans. The goal is to reduce tobacco use and promote the use of covered cessation services, including pharmacotherapy and counseling. Current efforts focus on tobacco cessation for pregnant women and members with chronic disease.	OHP-FCHP contract	1997–ongoing	Health plan determines activities suitable to members and plan. Health plans submit Milestone Reports, tracking the following: • Member education materials distributed • Zyban and nicotine replacement therapy prescribed • Behavioral counseling (telephone and class) provided • Oregon Quit Line referrals by providers • CAHPS smoking rate	All health plans
DHS Tobacco Prevention and Education Program (TPEP)	The program was developed from funds generated by Oregon Measure 44, which dedicated 10 percent of new tobacco taxes to tobacco prevention and education. The specific goals were to reduce peoples' exposure to secondhand smoke, counter pro-tobacco influences, help people quit, and eliminate health disparities.	State funds	1997–ongoing	• Oregon Tobacco Control Status Report: outlined the state of tobacco control in Oregon, and was created for a statewide tobacco control planning process that took place in the last quarter of 2003 and first quarter of 2004. • The TPEP Report is published prior to each legislative session, and describes program results. • *Oregon Tobacco Facts* was published as a reference for recent Oregon data on tobacco.	Not applicable to specific plans

Table A-1. Statewide tobacco cessation QI activities (continued).

Project name	Description	Funding	Time frame	Program activities	Participating health plans
Tobacco-Free Coalition of Oregon (TOFCO)	The coalition is a not-for-profit organization that includes businesses, organizations, and individuals who advocate for programs and policies that will decrease the toll of tobacco use in Oregon. The coalition's current focus is on increasing and stabilizing funding for TPEP and expanding the clean indoor air law.	Non-profit organization and individual donations	1994–ongoing	Advocacy	Not applicable
Smoke-Free Mothers and Babies Program	The program started as a demonstration project funded by Smoke-Free Families—a national program developed to help pregnant smokers quit—and employs evidence-based treatments. The project, located in eight counties in Oregon, targets pregnant women through Oregon's Maternity Case Management Program. The project implements the scientifically proven five-step smoking cessation counseling method for pregnant women, called the 5A's method.	The Robert Wood Johnson Foundation grant	2001–ongoing	Evaluation of pregnant women includes • baseline needs assessments with maternity case managers (MCMs) and prenatal care providers to determine current level of tobacco treatment services • follow-up surveys to assess improvements in delivering the 5A's and patient satisfaction surveys • tracking of client caseloads and referrals to Oregon Tobacco Quit Line	CareOregon COIHS Providence

Table A-2. Tobacco cessation QI activities, by health plan.

Health plan	Description
CareOregon	CareOregon created a tobacco cessation page on its member information website. Benefit information and resources were added to the provider page of its website. Developed a referral process with case management and quality improvement staff for members who wish to quit. Outcome measures tracked are the number of referrals to quality improvement staff by case managers, and number of referrals to the Free & Clear tobacco cessation telephone counseling service.
IHN	IHN tracks the members enrolled in smoking cessation classes, the members who successfully complete classes, and those who use pharmacotherapy for smoking cessation. Developed clinical prevention guidelines from the OMAP and U.S. Preventive Task Force guidelines, and distributed to all members and providers.
MPCHP	MPCHP offers smoking cessation classes at local hospital with a $50 gift certificate incentive upon completion. The class targets pregnant women to quit smoking but is open to everyone.
MRIPA	MRIPA conducts annual smoking cessation survey to members who use pharmacological agents. The survey tracks the number of tobacco replacement products and/or filled Zyban prescriptions, number of quitters, and number of members who decrease tobacco use. Personal calls and follow-up letters are mailed encouraging members to try quitting again; resources to quit are offered in the calls and letters.
Providence	Tobacco Cessation in Maternity Program Providence received a one-year, $50,000 planning grant from The Robert Wood Johnson Foundation's Addressing Tobacco in Managed Care Program for years 2002 to 2003. The grant's main objective was to develop a financial reimbursement system that gives obstetrical providers incentives to consistently deliver tobacco cessation advice to pregnant smokers, thus increasing adherence to the U.S. Public Health Service's tobacco dependence treatment guidelines (the 5A's). The project also established a statewide collaboration among various agencies promoting maternity tobacco cessation, including Providence, CareOregon, the Oregon Health Division, Tobacco-Free Coalition of Oregon (TOFCO), and researchers from Oregon State University. Center for Outcomes Research and Evaluation (CORE) collaborated with Charles Bentz, MD, the principal investigator for the project.
	Tobacco Cessation in Primary Care Program In late 2001, Providence received an evaluation study grant from the Addressing Tobacco in Managed Care Program of The Robert Wood Johnson Foundation. The length of the grant was two and a half years. The main objective for this study was to see whether giving providers feedback about compliance with treatment guidelines affected the number of patients seeking treatment to quit smoking. Other study objectives included measuring providers' compliance with guidelines, analyzing clinic characteristics associated with compliance, and analyzing the cost-effectiveness of tobacco cessation efforts.

Table A-3. Statewide QI activities regarding early childhood cavities prevention.

Project name	Description	Funding	Time frame	Measures	Participating health plans
EQR dental care studies	The EQRO performed three years of evaluation studies on dental care for children. Pregnant women were included in the final year of study in support of Project: PREVENTION!'s emphasis on early childhood cavities prevention and to provide baseline information about dental care during pregnancy. The goals of the dental study were to • promote continuity of review over the study years • evaluate the quality and quantity of care/services to children and pregnant women, including ECCP education • assess prevention activities • analyze patients' access to care/services • review patient utilization patterns	OMAP	1998 2000 2001	Chart review in conjunction with administrative data tracking • comprehensive initial oral exam • medical history documented • treatment plan documented • prevention activities	All health plans
Project: PREVENTION! Early Childhood Cavities Prevention (ECCP)	The ECCP project was initiated to decrease the prevalence of early childhood cavities and reduce associated health problems and costs resulting from the infectious disease process. Through established guidelines, expanded roles and responsibilities for health and dental practitioners, and a systems-wide approach, the project aims to improve the oral health of children and pregnant women in OHP.	OHP-FCHP contract	2000–ongoing	Health plan determines activities suitable to members and plan. Health plans submit Milestone Reports, tracking the following: • member's need for treatment • oral health assessments given • education or advice rendered • dental referrals and treatments given	All health plans

Table A-3. Statewide QI activities regarding early childhood cavities prevention (continued).

Project name	Description	Funding	Time frame	Program activities	Participating health plans
State Action for Oral Health Access	The goal of the program is to improve access to dental services for low-income, disabled, and minority populations. Oregon proposes to expand and enhance preventive programs for low-income pregnant women and children up to 24 months of age. The program will be divided into three demographically different communities, and partnerships will be developed with health plans, the private dental community, non-oral health practitioners, and federally qualified community health centers.	The Robert Wood Johnson Foundation grant through the Center for Health Care Strategies	2003–2006		CareOregon Cascade COIHS

Table A-4. Early childhood cavities prevention QI activities, by health plan.

Health plan	Description
DOCS	Access to pediatric dentists is a problem; pregnant women are often denied dental care. To increase access for children and pregnant women, the ECCP coordinator is working with the dental providers to increase access and assist with referrals.
CareOregon	CareOregon is working with MultiCare Dental Plan to increase the number of PCPs who assess oral health risks at well-baby visits and to refer infants to MultiCare dentists for fluoride treatment and other cavity prevention strategies. Sites will be prioritized for outreach and teaching PCPs along with an evaluation of the effectiveness of teaching. The project also aims to educate pregnant women on baby tooth care. Began working on billing issues in 2004.
Cascade	Cascade is focusing on increasing access to dental care by providing a dental "home" for pregnant women and infants. The goal is to develop an infrastructure that will continue after the funding ends; to lower the level of dental disease in Klamath County; to raise awareness of dental health; and share with other communities. Working cooperatively with community partners such as the county health department, the local dental college, the federal Special Supplemental Nutrition Program for Women, Infants, and Children (WIC), and Head Start programs.
COIHS	COIHS is using funds to improve access to services, education, oral health screening, and treatment for pregnant women and children up to 2 years, with the intent to reduce the incidence of early childhood cavities and reduce hospital utilization. COIHS intends to develop or strengthen partnerships with local organizations and utilize volunteer staff to provide free screenings. The WIC program will be a major collaborator, and the bulk of the screening clinics are expected to occur at WIC clinics. Treatment will not be provided through the grant. Referrals will be to private dental providers. The goal of the grant project is for dental providers and WIC staff to remind parents to return with infants and toddlers for a fluoride varnish application 3–4 times a year.
MPCHP	Access to dentists for children under three years is a problem, so MPCHP has encouraged PCPs to assess oral health and provide a fluoride varnish. Dental care organizations will facilitate education of physicians on fluoride varnish, use of xylitol, and the importance of obtaining dental care by age one.
OHMS	As part of an internal Emergency Department (ED) utilization study, OHMS looks at users of the ED for dental issues. Results found that the majority of ED users for dental care were OHP Standard benefit members (who do not have covered benefits). Exceptional needs care coordinators follow up with patients to see whether they have a dental provider and to educate them about dental benefits.

Table A-5. Statewide childhood immunization QI activities.

Project name	Description	Funding	Time frame	Program activities	Participating health plans
Immunization performance measure	Until 2003, the HEDIS® Childhood Immunization Status measure was submitted on an annual basis.[a] Starting in 2004, two refined measurements— an all-inclusive, and a steadily enrolled immunization rate—will replace the HEDIS measure. Submission of the performance measure is a required component of the OHP-FCHP contract under the quality assurance and quality improvement requirements.	OHP-FCHP contract	1998–ongoing		All health plans
Oregon Immunization Program: ALERT registry and AFIX (Assessment, Feedback, Incentives, eXchange)	Through the Immunization Program, providers' immunization practices are assessed and methods for improvement are discussed. ALERT is a statewide immunization registry that tracks child immunizations provided in the public and private sectors. ALERT is the result of a public/private partnership with Oregon Health Systems in Collaboration, the Office of Medical Assistance Programs, and the Oregon Preschool Immunization Consortium. AFIX is a continuous quality improvement process for immunization providers who want to improve immunization rates and practices using ALERT registry data.	DHS, public/ private partnership	1996–ongoing	No specific activities	

[a]HEDIS is a registered trademark of the National Committee for Quality Assurance.

Table A-6. Prenatal care QI activities, by health plan.

Health plan	Description
DOCS	DOCS has a program in place that rewards PCPs for notifying the health plan when a member is pregnant. Member services as well as maternity case management (MCM) services sends the member information and encourages her to seek and stay with her obstetrics provider. The MCM tracks members and contacts them to facilitate prenatal visits, educational opportunities, smoking cessation assistance, ECCP materials, and other optional services. DOCS tracks the number of babies in the neonatal intensive care unit (NICU) annually and the number of women seeking third-trimester prenatal care.
FamilyCare	BabyCare is an incentive program that encourages members to seek prenatal care throughout pregnancy. The primary goal is to reduce the incidence of complications during pregnancy and for newborns. Secondary goals are to assist members with timely hospital discharge, and to promote safety and wellness for the infant. A participating member who attends all prenatal exams will receive an infant car seat.
LIPA	LIPA Access Incentive Fund encourages obstetricians to care for OHP women. A monetary bonus is given for every OHP delivery as well as a bonus for submitting risk assessments for OHP pregnant women.
	LIPA Perinatal Outcomes Project This perinatal compliance enhancement program strives to establish early prenatal care for OHP pregnant women, improve collaboration with physicians and midwives, coordinate community and family resources, expand nurse case management, and improve documentation of outcomes such as the number of NICU days in a year. The program focuses specifically on providing compliance enhancement support at the request of, and in support of, the treating provider. Providers are encouraged to discuss individual patient needs with the care manager of the program. LIPA has reported fewer NICU days and fewer preterm deliveries.
	LIPA Baby First Program The program focuses on monitoring pregnant women during pregnancy through telephone contact. The nurse care manager acts as a resource liaison for the member through information, emotional support, encouragement, and educational materials. Members who complete this voluntary program are given an infant car seat as reward.
MPCHP	Identifies pregnant members through providers and notifies the state, if state is unaware. Contacts all pregnant women by mail or telephone to identify obstetrics provider, assist in finding a provider, and provide additional information on services for pregnancy, including dental care, transportation, alcohol and drug use services, and tobacco cessation counseling. Tracks the number of pregnant members with timely prenatal care.
MRIPA and OHMS	The Wee Wonders prenatal care program, funded through a grant from the Cow Creek Foundation, targets high-risk women, incorporating in-home visits by nurse case managers. It is a voluntary program, which rewards participants with a free, one-month supply of diapers. The program was started to facilitate enrollment of pregnant members into the county MCM services. Pregnant member participation for MRIPA increased from 0 percent to 61 percent; for OHMS, from 2 percent to 70 percent. Additional grants and donations have been secured to continue the program. Members who admitted to smoking were given focused encouragement and directed to resources for assistance in quitting.
Providence Beginnings	Providence Beginnings facilitates the collaboration of special nurses and social workers with doctors and midwives to provide a variety of services that support women during pregnancy. Services include comprehensive risk screening; case manager assessment and client service plan; connection to resources, advocacy, education and written materials; and support throughout pregnancy, hospitalization, and discharge.

Table A-7. Statewide asthma QI activities.

Project	Description	Funding	Time frame	Measures	Participating health plans

EQR Clinical Quality of Care Study: Childhood Asthma	The purpose of the study was to evaluate the asthma care provided to a sample of Medicaid managed care-enrolled children, using medical records.
	The measures were to
	• assess the education provided to children and/or their caregivers
	• determine whether early recognition of children with asthma is occurring in the primary care setting
	• assess the medications prescribed to treat children with asthma
	• identify opportunities for improvement activities that might help decrease the number of ED visits and/or inpatient admissions
		OMAP	1995–1997	Chart review and analysis of encounter and administrative data, for documentation of
				• a treatment plan
				• asthma education
				• a home smoking environment assessment
				• the use of beta-agonists
				• an influenza immunization
				• an assessment of the asthma treatment
				• additional indicators, including
				  ○ peak flow measurement
				  ○ lung assessment
				  ○ oxygen saturation measurement
				  ○ patient compliance levels
				  ○ steroid, theophylline, and cormolyn sodium prescriptions
				  ○ asthma severity
				  ○ activity level
				  ○ number of PCP visits
				  ○ distribution of visits
					All health plans

Table A-7. Statewide asthma QI activities (continued).

Project	Description	Funding	Time frame	Program activities	Participating health plans
Chronic Disease Data Clearinghouse	The Clearinghouse will be a repository for claims data from multiple health plans for diabetes and asthma patients. The data will be used for improving healthcare operations in physician offices or clinics. Physicians will provide feedback to health plans on the usefulness of the data and standardized reports for tracking the care of their patients with asthma or diabetes.	Oregon Health Care Quality Corporation Centers for Disease Control and Prevention (CDC) Oregon Asthma Program Oregon Diabetes Program	2003–ongoing	OMPRO is developing the Clearinghouse and managing the process which includes • imputing the member's primary care physician • creating a crosswalk for the plans' disparate systems for identifying practitioners and clinics • receiving data from the health plans • matching and merging member data for the physicians and physician groups • aggregating data into standardized reports • soliciting and receiving paper and electronic feedback from physicians regarding the accuracy of the information • providing updated files to the health plans • creating an analysis file with no personal identifiers for aggregate analysis • providing summary statistics of the process	All health plans are required

Table A-7. Statewide asthma QI activities (continued).

Project	Description	Funding	Time frame	Measures	Participating health plans
Health plan performance measure	Asthma performance measure: health plans will report two measures using specifications developed by the Oregon Asthma Data Work Group (ADWG): ED use and follow-up care, and use of pharmacologic agents	OHP-FCHP contract	2004–ongoing	ADWG measures were modified for OHP continuously enrolled members. Calculate for patients with persistent asthma who have one daily medication. Plans are measuring • use of ED and follow-up care within one month. • use of medication in one year o Standard measure >6 rescue dispensings o Enhanced measure ≥6 canisters	All health plans

Table A-7. Statewide asthma QI activities (continued).

Project	Description	Funding	Time frame	Program activities	Participating health plans
Oregon Asthma Program, which includes the ADWG, the Oregon Asthma Network, and other workgroups	A program of DHS Public Health, the Oregon Asthma Program works with partners from the public and private sectors to • ensure that all Oregonians with asthma receive optimal medical care • develop an asthma tracking system for Oregon • ensure people with asthma have the information and skills they need to manage their disease The program organizes and staffs the Oregon Asthma Network, a coalition of people throughout Oregon with an interest in asthma. Through a collaborative effort with community partners, the ADWG identifies and analyzes data sources, needs, and gaps.	Centers for Disease Control and Prevention	2000–ongoing	• Developed asthma tracking system for Oregon. • Publications include: o Guide to Improving Asthma Care in Oregon o Technical Specifications for Quantifying Measures in the Guide to Improving Asthma Care in Oregon	CareOregon COIHS DCIPA FamilyCare IHN MPCHP Providence Tuality
Asthma tracking pilot program	The Oregon Asthma Program awarded pilot grants for health systems to design and implement electronic data tracking systems that produce timely information for improving care delivered to patients with asthma in the primary care setting.	Oregon Asthma Program	2003–2004	Components of the asthma tracking pilot for both health plans include • identifying asthma patients through claims data or claims and pharmacy data • monitoring patients' ED or hospital use and following up with providers or specialists • creating reports for providers on individual and aggregate patient level • surveying patients with asthma • providing patient education and case management • tracking flu vaccinations	MPCHP Tuality

Table A-8. Asthma QI activities, by health plan.

Health plan	Description
MRIPA	Created a list of members diagnosed with asthma. Targeted and prioritized initial contact for pediatric members with asthma who had an emergency room visit or an inpatient hospitalization in 2002. The ENCC and QI Director developed an assessment sheet for initial contact, which includes questions about rescue and routine medications, members' perception of self-management, and possession of a peak flow meter.
COIHS	Provided education and support to members identified as having asthma, diabetes, or congestive heart failure (CHF). Created a dedicated nurse coordinator/educator position. Structured program with strategic plan, education plan, and program objectives. Intended outcomes included decreased hospitalization and ED costs, and improved quality of care.
Providence	The Asthma Management Program is an internal program for all Providence members with asthma. Interventions include quarterly educational mailings to members with asthma, and quarterly mailings to providers about medications and use of inpatient, outpatient, and ED services. Providence measured improvement in asthma care using HEDIS asthma medication measures.
CareOregon	The Asthma Intervention Program is a contract-funded program to improve management of asthma specifically in children ages 5–11. CareOregon provides self-management tools to children and families with asthma through individual and group learning and tracks the following data in the program: • documentation of asthma symptoms • utilization of services (ED, inpatient, and outpatient), • percentage of enrolled children who have an asthma action plan • percentage of children who have asthma who were seen by a provider during one year CareOregon generated asthma patient reports for providers on a quarterly basis. The reports included information on ED visits, inpatient hospitalization, follow-up visits after hospital visit, and medication use.

Table A-9. Statewide diabetes QI activities.

Project	Description	Funding	Time frame	Measures	Participating health plans
EQR clinical quality of care study: adult diabetes	The purpose of the study was to evaluate the diabetes management in a sample of Medicaid managed care adults. The goals of the study were to • promote clinical interventions that reduce diabetic complications • use positive outcomes to evaluate quality of care • determine whether selected American Diabetes Association (ADA) guidelines are used by providers • make diabetes management an ongoing clinical topic for QI studies • facilitate the health plans' development of internal capacity to monitor and improve diabetes care	OMAP	1996–1997	Chart review, in conjunction with encounter and administrative data, tracking • documentation of a physical exam: blood pressure and weight measurement, foot examination, and dilated retinal exam • laboratory tests: lipid panel, microalbuminuria/ proteinuria, glycemic control, HbA1c/HbA1, serum creatinine • documentation of treatment: documentation of hypertension and medication, prescription for ACE inhibitors • education in tobacco use, weight assessment and diet instruction; diabetes education; depression screening, noncompliance • referrals to mental health professionals • record of current medications • assessment of suicide risk	All health plans

Table A-9. Statewide diabetes QI activities (continued).

Project	Description	Funding	Time frame	Measures	Participating health plans
EQR clinical quality of care study: adult diabetes	The objective of the second and third years of focused study was to continue collecting data that facilitates comparison to the previous EQR study results. Other goals included • facilitating comparability to other health care initiatives through the use of standardized quality measurement guidelines • facilitating identification of members with diabetes • using positive outcomes to evaluate quality of care • facilitating the health plans development of capacity to monitor and improve diabetes care • promoting clinical interventions	OMAP	1997–1998 2000–2001	• Chart review • Documentation of o nephropathy o BP <140/90 o dilated retinal exam o neuropathy assessment o LDL test o identification of patients who use insulin and those who use oral agents • Administration of health screenings for depression, substance use/abuse, and/or tobacco use • Referrals/treatments for depression, substance use/abuse, and/or tobacco use	All health plans
Health plan performance measure	Diabetes care was chosen as a performance measure because of the high cost and prevalence of the disease in the OHP population.	OHP-FCHP contract	2000	HEDIS measure for comprehensive diabetes care	All health plans

Table A-9. Statewide diabetes QI activities (continued).

Project	Description	Funding	Time frame	Program activities	Participating health plans
DHS Oregon Diabetes Program, which includes the Oregon Diabetes Coalition	The program goal is to reduce the burden of diabetes in Oregon through a public health approach, in collaboration with partners in the public and private sectors. Activities are widespread and include the following statewide activities: • development and implementation of a diabetes morbidity and mortality surveillance system • adoption of guidelines for use in all managed care organizations to guide quality improvement efforts for diabetes care • identification of goals, objectives, and strategies for reducing the burden of diabetes The Oregon Diabetes Coalition is a broadly representative group that has sponsored or partnered in several statewide improvement initiatives.	Centers for Disease Control and Prevention	1994–ongoing	• Published Diabetes in Oregon: An Assessment Report • Adopted guidelines for care for use in managed care organizations: Measuring Quality of Care in Health Systems: Population-based Guidelines for Diabetes Mellitus • Published Oregon's Action Plan for Diabetes, which describes goals, objectives, and strategies for reducing the burden of diabetes in Oregon • Provided funding and technical assistance to help county health departments develop community-based assessment and planning projects. • Was a partner in the Oregon Diabetes Collaborative (I and II)	CareOregon FamilyCare IHN LIPA MPCHP Providence Tuality
Oregon Diabetes Collaborative	Two yearlong collaboratives that incorporated the Chronic Care Model and the IHI Breakthrough Series model to assist clinics in improving diabetes care and outcomes. Featured national and local expert faculty and clinic teams learning from each other. Clinics implemented diabetes registries for pilot groups of patients. Sponsored by OMPRO in partnership with Improving Chronic Illness Care (ICIC), a program of The Robert Wood Johnson Foundation, and the Oregon Diabetes Coalition.	Centers for Medicare & Medicaid Services The Robert Wood Johnson Foundation Oregon Department of Human Services	Collaborative I (2001–2002) Collaborative II (2003–2004)	• Patient o HbA1c level <8.0 percent o LDL-C level <130mg/dL • documentation of a patient self-management plan	COIHS CareOregon Providence Tuality Cascade IHN

Table A-9. Statewide diabetes QI activities (continued).

Project	Description	Funding	Time frame	Program activities	Participating health plans
Chronic Disease Data Clearinghouse	The Clearinghouse will be a repository for claims data from multiple health plans for diabetes and asthma patients. The data will be used for improving healthcare operations in physician offices or clinics. Physicians will provide feedback to health plans on the usefulness of the data and standardized reports for tracking the care of their patients with asthma or diabetes.	Oregon Health Care Quality Corporation Centers for Disease Control and Prevention Oregon Asthma Program Oregon Diabetes Program	2003–ongoing	OMPRO is developing the Clearinghouse and managing the process which includes • imputing the member's primary care physician • creating a crosswalk for the plans' disparate systems for identifying practitioners and clinics • receiving data from the health plans • matching and merging member data for the physicians and physician groups • aggregating data into standardized reports • soliciting and receiving paper and electronic feedback from physicians regarding the accuracy of the information • providing updated files to the health plans • creating an analysis file with no personal identifiers for aggregate analysis • providing summary statistics of the process	All health plans

Table A-10. Diabetes QI activities, by health plan.

Health plan	Description
COIHS	Provided education and support to members identified as having asthma, diabetes, or CHF. A dedicated nurse coordinator/educator oversees a structured program with a strategic plan, education plan, and program objectives. Intended outcomes included: decreased hospitalization and ED costs, and improved quality of care.
Cascade	Diabetes patients use glucometers to manage their diabetes. Management and utilization reports are sent to providers; patients needing education are referred to free nutrition class. All diabetes patients are targeted for smoking cessation services (through tobacco cessation activities) and nutrition education.
CareOregon	Participates in the Oregon Diabetes Collaborative by promoting the Chronic Care Model, specifically the use of educational materials on self-management tools and preventive screenings. Intended outcome is improvement in HEDIS measures for comprehensive diabetes care.
DOCS	Identifies members with diabetes (through provider referrals, member services, and medical management) and offers one-on-one case management with exacerbation of the disease process. Educational classes and support groups are offered through local hospitals. DOCS provides members with educational sessions with a registered dietician.
IHN	Using principles of the Chronic Care Model, IHN will equip all provider clinics and offices with DEMS, the electronic database registry. Patient reports will be generated for providers and IHN will conduct a health risk assessment to target members for diabetes management program.
LIPA	Diabetic Education Outcomes Project. Patients enrolled in the project are identified through enrollment in community diabetic education programs and meet criteria for having diabetes. Six months after receiving education, the patient is contacted by phone for follow-up. The intended outcome is increased patient knowledge about their key measures of diabetes management, such as their HbA1c, blood pressure, and cholesterol levels.
MRIPA	MRIPA will coordinate outpatient visits with the local hospital diabetes education department until its chronic disease management program is in place.
Providence	The Diabetes Management Program provides quarterly educational mailings to members with diabetes and quarterly provider mailings outlining recommended diabetes services. Measurable outcomes are HEDIS measures for comprehensive diabetes care.

Table A-11. Statewide depression QI activities.

Project	Description	Funding	Time frame	Measures	Participating health plans
EQR clinical quality of care study: adult depression	Focused studies on quality indicators of depression care for adults and adolescents were conducted each year. The goals of the studies were to • provide continuity of review elements • evaluate the assessment, treatment and medical management of adolescents and adults • identify documented communication between PCPs and other mental health/chemical dependency referral sources • facilitate the improvement of depression care provided in, or managed by, FCHPs	OHP-FCHP contract	1996–1998	Chart review, in conjunction with encounter and administrative data to track • documentation of complete medical history and physical examination • assessment of depression using a standard tool • assessment of substance use/abuse • documentation of a treatment plan • referrals to mental health professionals • documentation of education • psychotropic medications prescribed within Agency for Health Care Policy and Research (AHCPR) guidelines • assessment of suicide risk	All health plans
EQR clinical quality of care study: adult depression	Focused studies on quality indicators of depression care for adults and adolescents were conducted each year. The goals of the studies were to • provide continuity of review elements • evaluate the assessment, treatment and medical management of adolescents and adults • identify documented communication between PCPs and other mental health/chemical dependency referral sources • facilitate the improvement of depression care provided in, or managed by, FCHPs	OHP-FCHP contract	1999	Chart review, in conjunction with encounter and administrative data, tracking provider • assessment of depression using a standard tool, evaluating for severity • assessment of suicide risk	All health plans

Table A-11. Statewide depression QI activities (continued).

Project	Description	Funding	Time frame	Measure	Participating health plans
EQR depression continuous quality improvement project	This project grew out of OMAP's desire to develop effective interventions that would positively affect the treatment of depression.	OMAP	2001–2002	The project focused on two key practitioner interventions performing below expected levels: • documentation of ○ administration of a patient self-report depression rating scale • suicide risk assessment	CareOregon FamilyCare OHMS
Targeted Case Management Pilot Grant	The objectives of the grant were to • increase consultation between clinical pharmacists, primary care providers, and mental health professionals to improve medication management • implement depression recognition and care management in primary care pilot sites	OMAP	2002–2005	Measures include • reduction of patient's clinical depression symptoms • consistent use by providers of depression guidelines (including HEDIS measures for adherence and PCP follow up) • decreased utilization and cost of care for patients treated by intervention • percentage of patients receiving antidepressant and/or antipsychotic medication	CareOregon

Table A-12. Depression QI activities, by health plan.

Health plan	Description
CareOregon	The Robert Wood Johnson Foundation Depression Planning Grant (2002–2003) and two-year Robert Wood Johnson Foundation Demonstration Grant (2003–2005) CareOregon is working with the Multnomah County Health Department, Legacy Health System, and Oregon Health & Science University to improve treatment of depression in four pilot primary care clinics. The pilot clinics serve a predominantly low-income and racially and ethnically diverse patient population in the Portland metropolitan area. The interventions for the demonstration component are implementation of structural changes in the delivery and financing of depression care to support best-practice treatment of depression based on the Chronic Care Model. Intended outcome measures include reduction of patient's clinical depression symptoms, consistent use by providers of depression guidelines (including HEDIS® measures for adherence and PCP follow up), and decreased utilization and cost of care for patients treated by intervention.
COIHS	Provided depression assessment tool to providers; updated the depression practice guidelines.

Table A-13. Statewide QI activities regarding racial and ethnic health disparities.

Project name	Description	Funding	Time frame	Measure	Participating health plans
Health Disparities in Minority Health	A one-year grant for a small-scale, community-based project that addresses health disparities in minority communities. In partnership with the African American Health Coalition, the OHP plans that serve the metropolitan Portland members (CareOregon, FamilyCare, Providence) and OMAP are targeting OHP African American members to improve their knowledge of their disease. Health plans mailed informational brochures on diabetes and smoking cessation to African American members.	Health Resources and Service Administration, U.S. Department of Health and Human Services	2003–2004	The 2004 CAHPS survey measured the effectiveness of the brochure mailing to African American members.	CareOregon FamilyCare Providence
Racial and Ethnic Approaches to Community Health (REACH)	This program addresses the root causes of the disparity in the prevalence of cardiovascular disease (CVD) by providing health education, strengthened social support networks, and advocacy skills to combat racism.	Centers for Disease Control and Prevention	2003	CareOregon sent out mailings providing information on the topics of CVD, diabetes, tobacco use, health disparities in general, and how to access preventive services.	CareOregon
OMAP performance measures	The program performance measures were submitted by OMAP to DHS. Also, OMAP is responsible for providing program measures for the biannual report to the legislature.	OMAP-FCHP contract	ongoing	Improve access to annual ambulatory/preventive care by racial and ethnic groups including Asian/Pacific Islanders, African Americans, American Indian/Alaska Natives, and Hispanics.	All health plans
Improving Diabetes Care Among Hispanic/ Latino Patients with Diabetes	Kaiser, Providence, Regence BlueCross BlueShield of Oregon, and OMPRO collaborated to develop materials and activities to support increased diabetes monitoring by Oregon clinicians for older Latinos with diabetes. The project fostered and supported culturally appropriate clinical care that was focused on chronic disease management. An additional goal was to improve lipid-testing rates among Hispanic/Latino Medicare beneficiaries with diabetes.	Centers for Medicare & Medicaid Services Medicare QIO contract, Medicare Managed Care QI Project	2003–2005	Increase LDL-C and HbA1c testing among Latino patients with diabetes. Encourage active patient participation in managing their diabetes, through application of the Chronic Care Model.	Providence

Table A-14. QI activities regarding racial and ethnic health disparities, by health plan.

Health plan	Description
IHN	IHN activities overlap with county outreach activities, particularly to the Hispanic population. IHN and the county mailed needs assessment surveys to Hispanic members to get feedback on their healthcare needs (the survey addressed access to services, sufficiency of member information, etc.). Also IHN and the county are working on a plan for cultural competency training for health plan staff.
MRIPA	ENCC and MRIPA's member services staff surveyed the PCPs and specialty offices to assess their knowledge on accessing language services. MRIPA provided staff training on the use of interpretive services.
Tuality	Conducted an Interpretive Services Survey to inquire on the process for obtaining interpretive services for Tuality members and providers. As part of an asthma tracking grant, Tuality has administered a survey to members to identify differences between the Hispanic population and other racial and ethnic groups regarding the healthcare needs and service utilization of members with asthma.

Table A-15. Statewide QI activities regarding members with special healthcare needs.

Project name	Description	Funding	Time frame	Measure	Participating health plans
Measuring Outcomes for Children with Special Health Care Needs (CSHCN)	The goal of the project was to demonstrate the usefulness of an instrument for assessing functional development in children with special health care needs and evaluate their experience of care within a managed care system.	U.S. Maternal and Child Health Bureau grant	1998–2002	Measures for the project included assessment of • childrens' functional skills • families' satisfaction with care • physicians' perspectives about care for CHSCN	All health plans
Defining Oregon's Children with Special Health Care Needs	OMAP worked with plans to develop a common definition of CSHCN in Oregon to provide participating agencies with a common frame of reference as they plan, coordinate, and report services for this population. Several ICD-9-CM code lists were reviewed and compared. The final definition included criteria from several existing lists to take current plan definitions into account when identifying this population.	DHS	2000	Usable definition of CSHCN	CareOregon Providence
CaCoon (Care COordinatiON)	CaCoon is a statewide program designed to provide care coordination for families with children and young adults ages 0 through 20 years, with complex health conditions that result in the need for specialized medical, educational, vocational, and social services. The Child Development and Rehabilitation Center administers this program by contracting with county health departments to provide care coordination services in communities. Services are provided in the home, at local health departments, in the hospital, or by telephone consultation.	U.S. Maternal and Child Health Bureau Title V block grant	1987–ongoing	CaCoon provides support for families by • answering questions about their child's health needs and special care • helping them locate specialty resources including financial services for which their child may qualify • helping to prevent problems related to their child's condition • helping to coordinate services	All health plans

Table A-16. QI activities regarding members with special healthcare needs, by health plan.

Health plan	Description
CareOregon	Notify all new members that qualify for ENCC of ENCC services. Respond to requests in a timely manner.
Cascade	Identify ENCC patients through a health survey. Coordinate with local hospitals and agencies to develop discharge plans. Also have staff person to travel to homes of ENCC members.
COIHS	Outreach to the Phase II population[a] and CSHCN. ENCC staff conducts clinical reviews and service authorizations to detect members' needs. Creates annual report on the top 10 diagnoses by cost for the Phase II population.
DOCS	Approximately 30 percent of members are under ENCC case management. Special focus is given to coordinating members' needs with community partners. Member education and community education is ongoing to maximize resources and increase awareness of ENCC services.
FamilyCare	Formed new cross-cutting role for care coordinators to increase flexibility and services to members with special needs. Care coordinators will be versed in ENCC, triage, case management, and pharmacy benefits administration.
IHN	The Phase II population is identified through utilization data on clinical and administrative services. Monitors the Phase II population utilizing clinical indicators and other key references, such as OMAP guidelines and InterQual® criteria. The quality management committee reviews studies pertaining to Phase II members, such as utilization of services, member satisfaction, clinical services, and administrative review. Works with the health system case managers to promote continuity and decision making nearest the point of services. Will use a health risk assessment tool to target members for case management programs, the first of which will be diabetes.
LIPA	Continues to report Phase II membership to state. All Phase II members are notified about the availability of ENCC services.
MRIPA	ENCC staff sent a questionnaire to all Phase II members. Follow-up phone call made to non-respondents. Fibromyalgia support group information mailed to members with fibromyalgia or chronic fatigue syndrome to inform them of a free support group at the local hospital. ENCC staff involved in developing criteria for a limited number of physical therapy visits for members diagnosed with chronic low back pain.
OHMS	ENCC contacts Phase II members, who are identified through eligibility codes, community contacts, and discharge reports.

[a]Hunt SS, Davidson PB. Oregon Health Plan Medicaid Demonstration Analysis of Federal Fiscal Years 2004–2005 Average Costs. PricewaterhouseCoopers L.L.P. New York, New York. 2002. The Phase II population includes those eligible for OHP under the aid to the blind and disabled, old age assistance, and children served by the State Office for Child Welfare, primarily those in foster care.

Table A-16. QI activities regarding members with special healthcare needs, by health plan (continued).

Health plan	Description
Providence	A new software program documents case management activities. High-risk or ENCC members are identified through a health risk assessment that is sent to all new members. A case manager will determine the necessity for specific case management needs. Customer service, hospital discharge planners, case workers, and medical management staff serve as "case finders" for identifying members with complex needs. The Center for Outcomes Research and Evaluation (CORE) participates in a statewide taskforce with insurers and health providers to develop a standard definition for children with special healthcare needs. The sponsor of the study is the Child Development and Rehabilitation Center at the Oregon Health & Science University. The task force is geared toward early recognition of children in Oregon who need special services. One product will be guidelines for a system-level method of identifying special-needs children, using ICD-9-CM code lists. The second product will be a practice-level tool for screening and making an assessment of co-complexity.
MPCHP	ENCC members are identified through PCP referral, claims review, database, OMAP enrollment data, and other sources. The social and medical needs of members help formulate the care plan. ENCC visits are tracked electronically and member access, and timeliness of care are monitored.
Tuality	Adult- and child-specific surveys are sent to members identified with special needs. ENCC coordinators facilitate fulfillment of specified healthcare needs.